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ABSTRACT

This book contains eight papers from a detailed study of technical college provision in KwaZulu-Natal, South Africa, that raised the following four issues relevant to the transformation of technical colleges across South Africa: (1) the teaching and learning environment at technical colleges is suboptimal; (2) social relations at the technical colleges are tense, with few institutions having successfully come to terms with the rapid deracialization of student enrollments in recent years; (3) the labor market surrounding technical colleges appears totally dysfunctional, with few students obtaining employment after technical college training; and (4) the separate development policies of the past necessitate institutional restructuring. The following papers are included: "A Study of Technical Colleges in KwaZulu-Natal: A Methodological Introduction" (Andre Kraak, Graham Hall); "Problems Facing Further Education and Training" (Andre Kraak); "Planning Imperative: New Policy Framework in FET [Further Education and Training]" (Andre Kraak); "Socio-Economic and Educational Profile of KwaZulu-Natal" (Nisaar Mahomed); "Quantitative Overview of the Technical Colleges of KwaZulu-Natal" (Graham Hall); "Learning, Teaching and Management Environment: Evidence from Qualitative Studies" (Andre Kraak); "Autonomy and Responsiveness: Evidence from the Qualitative Case Studies" (Andre Kraak); and "Critical Overview: The Need for Labour Market and Institutional Reform" (Andre Kraak). The bibliography contains 52 references. (MN)

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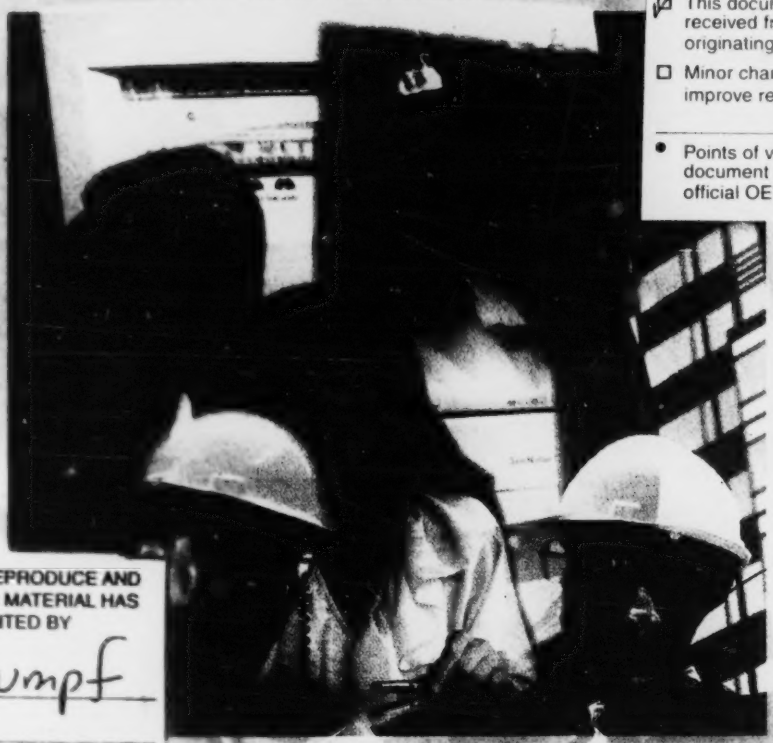

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TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)

A case study of technical colleges in Kwazulu-Natal

VOLUME I: QUALITATIVE FINDINGS AND ANALYSIS

OR SYSTEMIC STUDIES. GROUP EDUCATION & TRAINING. HSRC. SEPTEMBER 1999

Authors: Andre Kraak
and Graham Hall

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Transforming further education and training in South Africa

A case study of technical colleges in KwaZulu-Natal

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Volume One: Qualitative findings and analysis

Andre Kraak & Graham Hall
Unit for Systemic Studies
Group: Education and Training

HSRC
Pretoria
1999

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The HSRC hereby wishes to acknowledge the use of the postal questionnaire and structured interview schedule initially designed by the National Business Initiative for their research study into the technical colleges sector in the Gauteng Province. Both instruments were modified for use in the HSRC Investigation into technical colleges in the KwaZulu-Natal Province. We hereby thank the NBI for their co-operation in a very fruitful joint research endeavour.

Acronyms/Abbreviations

ABET	Adult Basic Education and Training
CAD	Computer-Automated Design
CAM	Computer-Automated Manufacturing
CHE	Council on Higher Education
CSS	Centre for Statistical Services
DBSA	Development Bank of Southern Africa
DET	The former Department of Education and Training
DNE	The former Department of National Education
DoE	Department of Education
DoL	Department of Labour
DTI	Department of Trade and Industry
EMIS	Education Management Information System
ERS	Education Renewal Strategy
ET	Education and Training
FET	Further Education and Training
FTE	Full-time Equivalent
GDP	Gross Domestic Product
GET	General Education and Training
GGP	Gross Geographic Product
GNP	Gross National Product
HDI	Historically Disadvantaged Institutions
HET	Higher Education and Training
HoA	The former House of Assembly

Hod	Head of Department
HoD	The former House of Delegates
HoR	The former House or Representatives
HRD	Human Resources Development
HSRC	Human Sciences Research Council
IT	Information Technology
KZN	KwaZulu-Natal
MEC	Member of Executive Council
MIS	Management Information System
NBFET	National Board of Further Education and Training
NBI	National Business Initiative
NCFE	National Committee on Further Education
NEDLAC	National Economic Development and Labour Council
NGO	Non-Governmental Organisation
NQF	National Qualifications Framework
NSA	National Skills Authority
OBE	Outcomes-Based Education
S&T	Science and Technology
SACSA	South African College Students Association
SAIRR	South African Institute of Race Relations
SAQA	South African Qualifications Authority
SETA	Sectoral Education and Training Authorities
SMME	Small, Medium and Micro-Enterprises
SRC	Students Representative Council
TECHNISA	Technical College of South Africa
UDF	United Democratic Front
UDM	United Democratic Movement
VET	Vocational Education and Training

Preface

This report comprises a detailed study of technical college provision in KwaZulu-Natal (KZN). The findings raise four significant issues relevant to the transformation of technical colleges nationally. Firstly, the teaching and learning environment is sub-optimal. Students receive little academic support and almost no academic development programmes exist for lecturing staff. Many curricula are out of date. Students with matric appear to gain little added value by enrolling for technical college 'N' certificates. Secondly, the social relations that characterise technical colleges are tense, with few institutions having successfully come to terms with the rapid deracialisation of student enrolments which has taken place over the past five years. Few of these institutions have strategies to deal with the extent of cultural and linguistic diversity that has now materialised on most campuses. These problems are likely to manifest themselves in racial forms unless they are urgently addressed. Thirdly, the labour market surrounding these institutions appears to be totally dysfunctional with few students obtaining employment after technical college training. Many colleges are trapped in the now obsolete 'trade school' identity of yesteryear. Few are responsive to the new economic and social demands that face South Africa. For example, few colleges appear to have training strategies geared towards the development of impoverished communities, the small business sector and the informal economy.

Lastly, there is clearly a need for institutional restructuring in view of the levels of course and infrastructural duplication that are a result of the separate development policies of the past. The formation of fewer mega-colleges located in key economic regions should be urgently considered as a way of renewing the relevance of these institutions to South Africa's new social and economic needs.

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Chapter 1

A STUDY OF TECHNICAL COLLEGES IN KWAZULU-NATAL: A METHODOLOGICAL INTRODUCTION

Andre Kraak and Graham Hall

1.1 DEFINITION OF FET

The FET band in South Africa is unique and complex. This is because the senior secondary phase of formal schooling has been incorporated within the further education and training band. This is not the case internationally where senior secondary schooling remains located within the general education band. As such, South African FET is exceptionally broad and all-inclusive. Formally, FET is defined as that band which provides learning programmes between the Levels 2-4 on the National Qualifications Framework (NQF). The FET certificate is awarded on completion of the requirements of NQF Level 4.

FET is the most complex and diverse phase of education and training, comprising four types of institutions (senior secondary schools, technical and community colleges, enterprise-based train-

ing, and a wide array of private providers, including for-profit and not-for-profit organisations such as NGOs). FET comprises three categories of learners: the pre-employed, employed and unemployed. Although responsibility for FET falls largely on the national and provincial Departments of Education, role players such as the Department of Labour, other government departments and private providers including companies, are also important participants in FET provision.

1.2 FACTORS LEADING TO THE ADOPTION OF THIS STUDY

1.2.1 Emergence of a distinct FET policy discourse

This study of technical college provision in KwaZulu-Natal (KZN) has its origins in a number of developments in 1997 and 1998. The first concerns the emergence of a distinct further education and training (FET) policy discourse that arose from the publication of four key policy texts on FET in 1997 and 1998. The first policy document was the report of the National Committee on Further Education (NCFE) entitled *A Framework for the Transformation of FET in South Africa* published on 14 August 1997. The NCFE consisted of experts and stakeholder representatives appointed by the Minister of Education in September 1996 to investigate the problems of FET and to make recommendations for its transformation. The Green Paper on FET, entitled *Preparing for the Twenty-First Century through Education, Training and Work* was released on 15 April 1998. The White Paper, *A Programme for the Transformation of FET* followed soon thereafter in August 1998. In a remarkably speedy process, the FET Act was finally passed through parliament and promulgated in November 1998. In addition, the Department of

Labour published a Green Paper in March 1997 on training entitled *A Skills Development Strategy for Economic and Employment Growth in South Africa.* The Skills Development Act was passed in December 1998.

The proliferation of policy documents on FET referred to above has resulted in the emergence of a distinct policy discourse on FET and an unprecedented research interest in the sector which was noticeably absent in the past. Key words in this new discourse (as will be elaborated in Chapter Three) include 'co-ordination', 'integration', 'articulation' and 'responsiveness'. Table 1.2.1 below summarises them.

Table 1.2.1: Key objectives of the new ET framework

Key concept	Other related descriptions	Central objective
1 Responsiveness	Relevance; innovation; dynamism; flexibility.	To develop the ability of ET institutions to respond more rapidly to emerging market demands and social needs at local, national and global levels.
2 Co-ordination	Strategic planning. State regulation of the ET institutional environment; state interaction with the market and civil society; institutional self-regulation.	Equipping the state to adequately regulate the confluence of policies across education, labour, macro-economic and labour market domains. Empowering autonomous institutions to govern themselves.
3 Effectiness	Efficiency.	Ensuring that ET institutions operate as well-functioning institutions and meet all their educational goals in a cost-efficient manner.

4 Articulation	Learner mobility; learner progression; integration.	Obtaining the maximum learner mobility across the differing subsectors of the ET system. Ensuring 'soft' boundaries between subsectors to encourage continuous or lifelong learning.
5 Partnerships	Linkages.	Encouraging institutional linkages across the differing subsectors (bands) of the ET system to ensure maximum learner mobility and regional resource sharing; building education-industry linkages; managing the schools-to-work transition through partnership agreements between employers and ET institutions.
6 Participation	Massification; enhancing equity.	Enhancing social equity through the increased participation by all social groups at all levels of the ET system; enhancing economic prosperity through the development of a high-participation ET system.
7 Democracy	Participatory; co-operative governance	Democratisation requires that governance of the system of higher education and of individual institutions should be democratic, representative and participatory and characterised by mutual respect, tolerance and the maintenance of a well-ordered and peaceful community life.

8 Diversity	Pluralism; meeting multiple economic and social needs.	Within the regulatory framework of a single national system, education and training must be flexible enough to allow differentiation of institutional mission so that differing institutions can meet differing social and economic needs.

The importance of these concepts is that they serve as the key anchors of the new policy framework in FET and hence provide very useful conceptual tools with which to understand and research the FET band. This study investigates the extent to which these concepts – for example, 'responsiveness' and 'effectiveness' – are relevant to the technical colleges of KwaZulu-Natal.

1.2.2 Absence of management information systems in FET

A second major factor shaping the need for this study is the chronic absence of an accurate national information database that covers the FET sector in detail and that can be used for comprehensive and coherent sectoral management and planning. In a 1998 review of all existing data sources on FET commissioned by the Department of Education, the author, Tim Mosdell, argues:

- Information generated from work done in the sector is diffuse and of uneven quality. This information is not centrally collated and is consequently difficult to use to get an overall picture of the sector.
- The various studies and investigations (completed on the sector) use different methodologies and data collection techniques making comparisons across studies difficult.
- With the exception of schooling data, most of the other sources

of data present once-off snapshot pictures of aspects of FET. This prevents effective trend and longitudinal analysis.

- Most of the information is blandly descriptive. Indicators related to equity and redress and responsiveness are generally difficult to construct given the lack of data collected. Indeed, a weakness in most of the available studies is the lack of data on race. Without this data it will be difficult to track progress towards achieving equity in FET.
- Much of the information currently available is too highly aggregated. With the new policy emphasis on planning at all levels of the system, aggregated data will be limited in its usefulness (Mosdell, 1998:3, 4).

Mosdell recommends that a comprehensive quantitative study of the FET band be undertaken:

- A quantitative audit of FET provision and demand is needed given the need to get a clear accurate picture of all facets of FET.
- The audit should draw and build on work already done in the sector.
- The audit should lay the basis/framework for routine, on-going collection of data on the sector.
- The audit needs to be structured in such a way to ensure that the nuances and complexities of the FET sector are recognised. It is important to take cognisance of the different sub-sectors, functional areas, goals and values, planned phases and levels of management of FET (Mosdell, 1998:4).

Mosdell also recommends that the task of co-ordinating the audit be given to organisations with a proven record of research in this field. He specifically mentions the expertise acquired by the HSRC and NBI in this regard:

> The HSRC's project on Technical College Education in South Africa, for example, demonstrates that organisation's ex-

> pertise in this field. Other organisations, such as those commissioned to research the funding of training for the NTB/NEDLAC study [the NBI] clearly also have capacity in this area (Mosdell, 1998: 56).

Mosdell's proposals and similar emphases in the policy documents mentioned earlier provide a wonderful 'window of opportunity' for the Human Sciences Research Council (HSRC). They all make an urgent plea for research to be done especially in terms of the development of a management information system (MIS) database for FET.

This research study is one contribution of a much larger and longer-term commitment by the HSRC to undertake research in the FET band.

1.2.3 New HSRC research programme on FET

A third significant development shaping the character of this research project has been the realignment of the research focus of the Unit for Systemic Studies in the Group: Education and Training of the HSRC to incorporate a much stronger focus on FET. This change has been motivated for a number of reasons, the most important being the shift in research priorities in ET since the events of April 1994 which led to the formation of South Africa's first democratically elected government. Questions of economic development and employment now occupy centre stage. As a consequence, government departments, donor agencies and other research organisations are now increasingly asking strategic research questions concerning the *interaction* between three important institutional domains:

- *education and training institutions,* especially FET and HET institutions;
- the macro-economic policy framework of government and its

impact on *employment* and poverty;

- *the labour market, most particularly those institutions and* conditions, that influence the process of transition from ET to the world of work.

The HSRC's Unit for Systemic Studies is dedicated to investigating the dynamics of this interaction between education, the labour market and the world of work. It has adopted a new programme theme entitled *The Interaction of Policy and Implementation in Education and Training* to further that end. A study of technical colleges, therefore, is a critical component of this policy formulation/policy implementation continuum.

1.2.4 Building a partnership with the National Business Initiative

A fourth factor influencing the adoption of this research project was the commissioning by the Minister of Education in the Gauteng Province of the National Business Initiative (NBI) to undertake a situational analysis of all publicly funded technical colleges in Gauteng. The HSRC assisted in this study but also undertook to use the same research instruments – designed originally by the NBI for the Gauteng study – in its own case study of technical college education in KwaZulu-Natal. This would facilitate comparative studies of technical college provision in two provinces using comparable data forms.

1.2.5 KZN request for research assistance

This study arose in the final instance from a request made by the Human Resource Development Strategy Task Team of the KZN legislature to the HSRC in February 1998 to assist with research on

a human resources development strategy for the province. Follow-up meetings with the coordinator of the task team and the Director-General of Education in KwaZulu-Natal led to a formal decision that the HSRC should undertake a 'situational analysis of all publicly funded technical colleges in KZN' as an initial contribution to the production of a larger human resource development strategy for the province.

1.3 RESEARCH METHODOLOGY

A situational analysis is largely a descriptive mapping of a sector under study. It differs in significant ways from a technical audit (a strictly descriptive exercise) in that it provides for a qualitative coverage of other key issues. As is elaborated below, some of the key issues informing this project are the articulation with and effectiveness of these colleges in their local economy and community. It is also an interpretative exercise because it involves highlighting the trends that are observed in the data collected, as is the case in Chapter Six with regard to teaching and learning environments, in Chapter Seven with regard to issues of autonomy and responsiveness, and Chapter Eight which focuses on labour market and institutional effectiveness.

Qualitative research methods are useful in complementing quantitative research results because they have the potential to penetrate 'beneath the surface' for instance highlighting the underlying institutional cultures and social tensions. As will be seen in Chapters Six to Eight, these techniques have proved invaluable in revealing the tense social relations underpinning student social life and the problematic culture of learning and teaching prevailing in some of these institutions.

1.3.1 Key issues informing the research design

The eight key conceptual descriptors highlighted in Table 1.2.1 were pivotal issues shaping the lines of inquiry in this study. Some of the key issues explored were the following:

- *Efficiency*: those organisational conditions that give rise to the efficient funding of programmes and the optimal utilisation of resources and infrastructure.
- *Responsiveness*: ET institutions that are responsive to the demands of the market (at local, regional and national level) for specific types of skills and capabilities. Responsiveness entails being able to read labour market signals regarding declining and ascendant occupational skills; it is about the effective planning, marketing and utilisation of college resources.
- *Equity:* equitable access to college education regardless of race, gender, age, employment status or disability.
- *Quality:* ET provision of a high standard – comparable to equivalent programmes at other institutions nationally and internationally.
- *Articulation:* the facilitation of learner progression between ET institutions horizontally and vertically, and between ET institutions and the world of work.

These themes influenced the construction of the questionnaires and the case study interview schedules. They also underpinned the interpretation of the data collected in the research exercise.

1.3.2 Key methodological instruments and steps

The research design identified five key steps. These are discussed in some detail below:

1.3.2.1 Designing a quantitative questionnaire

A questionnaire instrument was posted to the principals of each of the 25 colleges investigated in KwaZulu-Natal. The questionnaire was designed specifically to provide comprehensive quantitative data on

- the financing, management, governance and administration of technical colleges;
- the teaching and administrative staff, including staff capacity and human resource development;
- course development and evaluation;
- the main vocational fields and subfields of learning;
- the teaching staff classified by age, gender, race and qualifications;
- administrative and support staff by age, gender and racial classification;
- the time spent by teaching staff on administrative and teaching duties;
- the physical infrastructure (both teaching and administration), utilisation of facilities, availability, condition and utilisation of boarding facilities;
- the number of students attending various national and non-national programmes in all vocational fields and subfields;
- student age, home language and gender profiles;
- the pass rates and throughput rates in each instructional offering.

A 100% return rate was obtained in the collection of the completed questionnaires as a result of the continuous follow-up and support given by the HSRC research team.

1.3.2.2 Developing a methodology for the qualitative case studies of institutions

KwaZulu-Natal has a total of 25 technical colleges – 24 are publicly funded and one is private. Case studies of about half of these (13

colleges in all) were undertaken in order to 'get behind the numbers' and assess college provision in terms of effectiveness/appropriateness, responsiveness, equity, quality, efficiency and articulation. The 13 colleges were selected on the basis of certain fixed criteria:

- *The locus of control* of the institutions in the former apartheid system. Were they former House of Assembly colleges (ex-HoA institutions for whites only); former House of Delegates colleges (ex-HoD institutions for Indians only); former House of Representatives colleges (ex-HoR institutions for coloureds only); former Department of Education and Training colleges (ex-DET institutions for Africans only); or lastly, former KwaZulu institutions for homeland (predominantly African) residents only?
- *Geographic location* – were they urban or rural institutions?
- *Size of institution* – were they large or small colleges?
- *Source of funding* – were they publicly funded or private?

Using the above criteria, the breakdown of the colleges selected for the qualitative case studies was as follows:

TABLE 1.3.2.2: Institutions selected for the qualitative study of technical colleges in KwaZulu-Natal

College type by former status in the apartheid education system	Number of institutions selected
Former House of Assembly colleges (ex-HoA):	5
Former House of Delegates colleges (ex-HoD):	2
Former House of Representatives colleges (ex-HoR):	1
Former Department of Education and Training colleges (ex-DET):	2
Former KwaZulu Homeland colleges:	2
Private colleges:	1
TOTAL SELECTED FOR SITE VISITS	13

Each college was asked to provide information in advance, for example copies of annual reports, mission statements, business and training plans, reports to governing bodies, and so forth, which were then studied prior to the site visits. The visits to each college typically consisted of

- a tour of the college facilities, to provide a context for subsequent interviews;
- interviews with the senior management team;
- interviews with other key personnel, for example the chair of the governing body;
- meetings with staff representatives;
- discussions with students/trainees representatives;
- discussions with other stakeholders, for example local employers and community representatives.

Institutional anonymity was considered a critical factor in the qualitative research. Whereas in the presentation of the quantitative results in Chapter Five where each college is identified by name, it was decided not to reveal these identities in the qualitative findings presented in Chapters Six to Eight. This enabled an honest and sometimes critical appraisal of the conditions of technical college provision in the province. The priority throughout the research project was to present an analysis of the problems facing colleges in general and their possible solutions and not to identify specific colleges with problems and difficulties.

1.3.2.3 Site visits

Two days were allocated for each college visit. Pairs of researchers visited each of the selected colleges during July/August of 1998. Detailed case studies were then written up on each college visited. The 13 case studies produced in this manner provided the major source of information for the qualitative synthesis and analysis contained in Chapters Six, Seven and Eight of this book.

1.3.2.4 Stakeholder consultations

The research process also entailed two meetings in the province with the technical college principals – the key stakeholders in the research process. The first introductory session was held in Pietermaritzburg on 21 May 1998 and the second session – a presentation of the preliminary findings – was held in Pinetown on 11 November 1998. These sessions yielded invaluable input from the principals which led to revisions and improvements in the research instruments and the initial findings. A draft version of this book was circulated as a final step in the process of data verification, allowing college principals and senior academic staff a final round of critical input before the report results were finalised.

1.3.2.5 Data processing and analysis

Professor Graham Hall, Rector of the Johannesburg College of Education, was employed on a consultancy basis as the quantitative analyst for this study. He also served in this capacity in the NBI study of Gauteng technical colleges. The results of his quantitative analysis are presented in Chapter Five. A detailed appendix containing the total set of quantitative results is available on request from the HSRC.

1.4 ISSUES CONCERNING DATA PROCESSING AND DATA VERIFICATION

1.4.1 Development of the questionnaire

The first comprehensive questionnaire for use in the technical college sector was developed for the research project 'Technical college education in South Africa' conducted by the HSRC in 1993. This questionnaire was modified and reduced in length for the 'Situational analysis of technical colleges in Gauteng' prepared by

the National Business Initiative in 1997. The NBI and the HSRC agreed that the same questionnaire would be used for the Gauteng and the KZN studies. The use of a common questionnaire resulted in a reduction in the development time of the project and a considerable saving in costs. The KZN study also benefited from the experience gained in the development of the Gauteng questionnaire.

Any in-depth study of an institution can lead to anxiety and fear among the staff of the institution. Given the uncertainty and negativity that currently prevails in these institutions, it was essential to obtain the collaboration of the principals prior to commencement.

At the initial meeting with technical college principals on 21 May 1998 attempts were made to allay any fears that the research might arouse. The response of the principals at the workshop was positive and very few, if any, difficulties were raised by them. Unfortunately, the representatives of a number of the colleges were not present at this workshop and almost without exception it was these colleges that presented problems in the data collection process.

Questionnaires were sent to each college in June 1998 and, due to the length and complexity of the questionnaire, a month was allowed for the respondents to complete them.

1.4.2 Data capture

In July 1998 the questionnaires were returned to the HSRC for control purposes prior to the data capture process. The information contained in the questionnaires was captured directly into a structured database, which enabled the analysis of the quantitative data using standard statistical packages. The reliability of any data set depends on the accuracy with which the instrument is completed and on the accuracy of the data capture. Personnel, who had gained

experience and expertise in capturing the Gauteng data, were employed to capture the KZN data. This resulted in a very high degree of data capture integrity. Sophisticated error detection routines were built into the data capture programmes to reduce data capture errors to a minimum.

1.4.3 Difficulties with data collection and data capture

It became apparent very early in the data capture process that the information from a number of technical colleges was either missing or could not be captured because incorrect codes for the programmes had been used. Considerable difficulties were experienced in the collection of data from four or five colleges. In the end, the only successful way of obtaining the outstanding questionnaires was to visit the colleges in person.

At the initial meeting with the college principals the questionnaire was thoroughly discussed and the principals had not raised any objections. It was assumed that the information requested was readily available – indeed, the response to one of the items in the questionnaire indicated that the colleges themselves believed that this was the case. However, this was not so. To improve the reliability of the information the processed data were returned to the colleges for correction and verification in October 1998. The data were presented in such a way that the colleges could easily detect any missing or incorrect information.

A preliminary presentation of the findings on 11 November 1998 proved helpful in explaining to the college principals the importance of accurate data and the need for their ownership of the data they submitted on behalf of their institutions. The principals were asked to sign a declaration that the corrected data had been checked. This proved to be an expensive and time-consuming process.

Despite these efforts, reliable information on staff qualifications, student numbers and success rates was not forthcoming from four colleges. Only one conclusion can be drawn – the administration of certain colleges is being seriously undermined by the lack of up-to-date and correct data. It is obvious that in some colleges accurate information is simply not available.

1.4.4 Reliability of the data

As has been indicated, data from certain colleges were either missing or seriously flawed. Because of the inability of four colleges to provide key information on headcount, success rates and the qualifications of teaching staff, it was decided to obtain the missing information from the enrolment figures for the examinations held by the national Department of Education in Pretoria. The information from the national department was checked against aggregated headcount and full-time equivalent (FTE) data from the KZN department of education. Taking into consideration that these problems were encountered in only four of the 25 institutions, and given that alternative information was made available for these four colleges from the examinations office of the national Department of Education, it is estimated that the database, on which the research in Chapter Five is based, is approximately 95% accurate. The HSRC is satisfied that this is a reasonable research achievement given the absence of comprehensive databases in the FET band. We hope that the difficulties expressed here regarding data collection will serve as an incentive for government to speed up the process of establishing an effective national management information system for the technical colleges sector and for FET as a whole. The HSRC research programme in FET is committed to assist in this regard.

Chapter 2

PROBLEMS FACING FURTHER EDUCATION AND TRAINING

Andre Kraak

2.1 INTRODUCTION

Further education and training (FET) in South Africa faces a multiplicity of problems. Three are definitive: educational deficiencies within FET itself; the collapse of the labour market, particularly for the young and out-of-school; and the dual pressures of globalisation and democratisation which are having a profound impact on the character of the FET system. Each of these factors will now be looked at in some detail.

2.2 DEFICIENCIES IN THE CURRENT PROVISION OF FET[1]

2.2.1 Absence of a single co-ordinated FET 'system'

The idea of a single FET band is new to South Africa. The four diverse components that are viewed as making up the FET band –

senior secondary schools, technical colleges, industry trainers and private providers – do not currently constitute a meaningful 'system' . There has never been a tradition of co-ordination and planning across these four major components to forge a sense of 'system'. Hence, what currently exists is merely notional – the policy ideal of a coherent FET band (NCFE, 1997:10, 21). Its establishment is the primary goal of the new FET policies reviewed in the next chapter.

The significance of the FET band lies in the coherence of its four subsystems, and also in its external linkages to higher learning and work. FET systems worldwide are fundamentally shaped and judged by the effectiveness of their articulation with the world of work, on the one hand, and the extent to which they grant meaningful access to further and higher learning, on the other. In South Africa, regrettably, the current FET system has failed on both counts. There is a powerful sense of failure within the system with regard to the quality and relevance of FET programmes, resulting in inadequate preparation for higher levels of learning. The FET sector has failed to link many young learners to real employment prospects in the world of work, and it has also failed to provide a meaningful learning pathway for employed adult workers to return to formal study so as to improve their overall skills and competencies.

The following are some of the specific 'systemic' problems that characterise FET today:

- *Horizontal and vertical divisions in the governance of FET*: FET is horizontally differentiated across a wide range of ministerial jurisdictions – for example, various tertiary colleges fall under the control of the Departments of Education, Agriculture, Health and Police. FET is vertically differentiated between national and provincial competencies. FET also overlaps with higher education in the provision of programmes at NQF levels 4 and 6.

- *Programme fragmentation*: Current FET programmes are fragmented and disorganised. There is a confusing array of programmes with few points of articulation and little equivalence between them. Programmes differ widely with respect to quality, standards of provision, outcomes and curriculum.

- *Education and training – separate tracks:* FET is currently fractured into two separate and impermeable streams. General education, on the one hand, and training programmes, on the other, are regarded as completely separate entities. Senior secondary schools are designed primarily for the purposes of academic learning. Few schools have linkages to the world of work and few incorporate career or vocational education courses into their formal academic curricula.

  In addition to these problems, many black South Africans have received an inadequate general education with few 'second-time' opportunities to complete formal schooling in adult learning institutions. At the same time, few new entrants into the labour market receive adequate training to equip them with the skills and knowledge required to attain and retain employment. Individuals also lack the skills required to start a small business.

- *Negative perceptions of technical and vocational education*: Outside the formal secondary school sector, FET does not have a good reputation, and vocational education and training lacks parity of esteem with traditional academic schooling. Current perceptions of the non-academic institutions within FET, for example the technical high schools and the technical colleges, are that they offer a second-rate, poor-quality education. These perceptions are hard to abandon, resulting in the perpetuation of the stigma attached to further education and training. It is therefore not surprising that the strongest aspiration among matriculants is to

move from matric to higher education rather than to further education and training.

- *Low staff morale, poor work ethic:* The adverse working conditions in the FET band, particularly for staff in the colleges sector, has led to low morale, a low work ethic and low professional self-esteem. An authoritarian management culture still pervades many institutions, which serves to accentuate the racial and gender divisions within the sector.
- *The college sector – weak institutional capacity:* Technical colleges are perhaps the most neglected and underdeveloped institutions in the South African educational landscape. Historically, they have existed on the margins of formal schooling and higher education. They have become highly differentiated institutions due to the racially defined financial skewing between state-aided (those previously 'white' institutions that were granted semi-autonomous status) and those state colleges that fell under the direct control of the ex-Department of Education and Training (for Africans only). In general, African technical colleges have had a short and difficult history. In the pre-1979 period, many were deliberately located in the Bantustans, often unconnected to a viable local economy and unlinked to an effective social development strategy. The 1979-1981 period represented a new phase for colleges because it was then that the Wiehahn and Riekert Commissions of Inquiry made provision for the permanent urbanisation, unionisation and apprenticeship of black workers in the former white urban industrial centres of South Africa. New colleges sprang up, and changes began to occur. However, almost all of the former Department of Education and Training (ex-DET) and Bantustan colleges are still young institutions (under 20 years of age). Because of the turbulence of the past 20 years, there has been insufficient time for the

establishment of partnerships with industry and an effective culture of learning.

The lack of a sense of system was a major criticism of the FET sector in the Education White Paper *A Programme for the Transformation of FET: Preparing for the Twenty-First Century through Education, Training and Work*:

> Our policy is to establish a co-ordinated FET system which integrates education and training. However, we have to recognise the substantial constraints and difficulties imposed by our history and by current arrangements. Across all levels and sectors of our education system, the social and economic divisions of the past remain strongly in evidence. Our country still lacks a coherent, integrated strategy for human resource development. Education and training policies still operate largely along separate tracks, despite the unifying influence of the NQF. Despite the existence of some excellent institutions and innovative programmes, FET provision today is characterised by fragmentation, poor co-ordination, inefficiency and inequality. In fact, it is difficult, in the present context, to talk at all of a FET system (DoE, 1998b: 12).

2.3 MALFUNCTIONING LABOUR MARKET

South Africa's labour market is perhaps the most visible product of apartheid's negative historical legacy. While the key social institutions and practices of the past (such as job reservation, pass laws, influx control, segregated townships and low-wage labour) no longer exist, their negative impact lives on. The labour market is still structurally dysfunctional having inherited a set of ET institutions and occupational realities that do not meet the new competitive economic requirements. The current labour market framework is failing in its task of facilitating the articulation between education,

training and work. A number of key indicators highlight the extent of this malfunction:

2.3.1 Increases in matriculants, jobless growth and mass unemployment

South Africa during the 1980s witnessed a sharp contraction in the total number of jobs available in key economic sectors. Manufacturing experienced a sharp decline of 12% in employment from 1985 to 1991. Similarly, mining underwent a 13% contraction in the same period. Large-scale retrenchments continue in these sectors today. It has only been the commercial, financial and community service sectors that have seen moderate employment growth in the past decade – but at a rate not sufficient to compensate for the loss of jobs in other sectors. In more recent years, economic growth has increased and fluctuates between 2-3% of gross domestic product (GDP) but without the addition of new jobs. As a consequence, South Africa faces an unemployment crisis ranging between 20-50% of the black population, especially in the Eastern Cape, North West and Northern Provinces. In addition, small, medium and micro-enterprises (SMMEs) and the informal economy are underdeveloped and dwarfed by the dominance of large companies in the manufacturing sector. They are therefore unable at present to provide large numbers of new jobs. Paradoxically, jobless growth is occurring at a time when the survival rate in black schools has improved, resulting in larger numbers of black matriculants entering the job market each year – but with most facing unemployment. Jobless growth is also occurring at a time when shifts in the existing occupational structure are afoot, particularly the shift towards more intermediate and high-skill jobs. For example, the proportion of skilled workers with Standard Ten plus a degree rose from 4,3% in 1973 to 8,6% in 1993; the proportion of skilled workers with

Standard Ten plus a diploma rose from 5,7% to 8,7%; and the proportion of skilled workers rose from 28,6% to 48,4%. In sharp contrast, the semi-skilled and unskilled categories experienced a decline in numbers from 61,3% to 48,4% in the same period. It is evident that the labour market is highly dysfunctional in its inability to match school outputs with available and emerging jobs (Abedian and Standish, 1992; Kraak, 1995; Standing, Sender and Weeks, 1996).

2.3.2 *Persistence of racial obstacles to occupational mobility*

Minimal black advancement has taken place in the period since the formal scrapping of job reservation and other labour market restrictions in 1980. For example, African mobility in the 'professions' constituted a mere 5,8% increase in the 1985-1991 period with Africans occupying 34,2% of all jobs in this category. In the important managerial category, black advancement grew from a 2,7% share in 1970 to 2,9% in 1980 to a larger 9,6% share in 1991. Although the rate of increase has been rapid the sector is still dominated by white employees. In another important occupational field, white workers still dominate the annual indenturing of apprentices – comprising 74% of those indentured in 1990 (statistics by race have not been produced since that year). The only sphere of significant change for black workers has been their penetration of semi-skilled work. African workers have replaced white workers since the mid-1970s as the dominant stratum of semi-skilled production workers. They are now the backbone of the manufacturing industry (Abedian and Standish, 1992; Kraak, 1995; Standing, Sender and Weeks, 1996).

A number of factors have coalesced to create these obstacles to occupational mobility. Employers at the local level continue to hire

workers on a racial basis even though legislated job reservation has long been abandoned. Qualification inflation is another contributing factor, whereby employers simply raise the academic entrance levels required for jobs and, in so doing, exclude many new black job seekers. And finally, the absence of large-scale training programmes and career pathing in industry has meant that few workers with jobs have been able to move up the occupational ladder. The status quo remains (Kraak, 1995).

2.3.3 *Paradox of skill shortages in the face of declining investments in training*

A key contradictory feature of the South African labour market has been the claim by employers and labour market experts of acute skill shortages in certain fields at precisely the time when employers have cut back on skills training. These claims have been made ever since the boom years of the late 1960s. They have had some validity in certain specific occupations requiring high skills and high-tech inputs, for example in new technological fields such as informatics and biotechnology, and in the demand for high-tech artisans. The claims also arise as a consequence of the general drift to more intermediate and high-skill jobs. However the generalised claim regarding skill shortages is probably more a reflection of the dissatisfaction among employers with the poor outputs of apartheid schooling and the massive illiteracy levels of semi-skilled workers.

These claims appear contradictory when the training track record of employers is scrutinised over the past two decades. In figures provided by the Department of Labour, total industrial training undertaken by the private sector and public training centres declined from a peak of 736 581 in 1986 to a dismal 205 260 in 1994 – a mere 2,9% of the economically active population who received

some form of training. Registered apprenticeship contracts declined from 33 752 in 1985 to 22 015 in 1994, and the annual indenturing of apprentices declined from 11 573 to 5 002 in the same period. Enterprise-based training declined from a peak of 457 255 in 1984 to a dismal 85 736 in 1994 (DoL, *Annual Report*, 1995). In a report commissioned by NEDLAC in 1996, it was shown that only 12% of firms do not train. However, if dissaggregated, the figures show that only 25% of small firms train, 42% of firms spend less than 1% of payroll on training, and 65% of firms spend less than 2% of payroll. In another study, while 87% of firms claimed to train, about 70% provided only initial induction-type training to entry-level workers. Of those firms who claimed to do retraining, 74% acknowledged that it was only informal on-the-job training (DoL, *Annual Report*, 1995; DoL, 1997).

2.3.4 Collapse of the youth labour market

The most socially devastating impact of this institutional malfunction has been the collapse of the youth labour market. As more and more black youths survive the school system and matriculate, fewer and fewer jobs are available to them. It has been estimated that by the year 2005 there will be at least 250 000 students with matriculation exemption and a further 500 000 with a FET certificate. If efficiency and pass rates improve in the intervening years, the numbers could expand to over 800 000 school leavers with a FET certificate (Simpkins and Hofmeyr, 1996). Half the estimated four million unemployed are young people under the age of 30 with at least nine years of schooling. Solutions to the collapse of the youth labour market lie primarily in the establishment of high levels of job-creating economic growth. However, the apparent irrelevance of 9-12 years of formal schooling in getting a job is also

a major indictment of the current matriculation system. Such irrelevance sends obvious signals that a greater convergence is necessary between formal schooling and the needs of the world of work.

2.4 DUAL PRESSURES FOR CHANGE

The pressures for change in South African FET are dual. In the first instance, change arises from socio-political demands that have to do with redressing the destruction of apartheid in the educational realm. These demands also concern the construction (currently under way) of new democratic social relationships between state, civil society and ET institutions. In the second instance, change is required because of socio-economic pressures. These primarily concern the phenomenon of 'globalisation' and South Africa's re-entry into a highly competitive and volatile world economy.

2.5 DEMOCRATISATION: THE SOCIO-POLITICAL PRESSURES FOR CHANGE

Fundamental social change is under way in post-apartheid South Africa. The elimination of the racial and class inequalities of the past are now the central focus of much new government policy. This reform thrust is shifting to include FET institutions. Expectations that these institutions will be able to contribute significantly to the social development of previously marginalised communities are high. This is reflected in a number of key demands currently being placed on the FET sector. They include demands for 'redress', 'lifelong learning', and the creation of a new 'state-citizenship' relationship. Each of these demands is briefly discussed below.

2.5.1 Redress: institutional and human transformation

A central theme that has underpinned the social, economic and political changes under way in South Africa since the first-ever democratic elections of April 1994 has been the theme of effecting substantive redress for the injustices done to the black majority under apartheid. This theme now pervades all policy propositions of the new democratically elected government. In FET, it relates to the establishment of representivity in the staff composition of institutions, to equitable access to learning for all students, to equitable funding arrangements, to effective staff development programmes for those denied career opportunities previously, and to capacity-building and re-engineering processes for those FET institutions denied proper resources and responsibilities under apartheid. These social changes are central to the new FET policy framework to be outlined in the next chapter.

2.5.2 Lifelong learning and the massification of the ET system

Another social pressure on the South African FET system has been the worldwide trend toward greater access to further and higher ET, producing a massification of the ET system and the growth of lifelong learning. The impact of these pressures has led to a major shift in the institutional organisation and delivery of programmes in FET and in HET since the late 1980s – leading to what Peter Scott has described as a shift from 'closed' to 'open' ET systems (Scott, 1995). A key feature of this shift is the growth of recurrent, continuing and professional education in FET and HET institutions. In the first instance, this expansion and diversity in programme delivery has been an economic response. The information economy

has required a better educated and trained work force, and this has been reflected in the massive expansion of technical, vocational, career and paraprofessional programmes offered in recurrent, continuing and distance modes. 'Lifelong learning' has become the all-encompassing catch phrase that gives expression to the dramatic changes occurring in the new modes of learning, in the diverse age groups of learners and in the wide range of programmes on offer.

In the second instance, growth in recurrent and continuing education is an educational response, an attempt to improve the learning methodologies available to adult learners and to provide more opportunities for community and self-development. As such, FET institutions today are much more responsive to the social and community demands placed on them to serve as effective public resources open to all. For example, most part-time, recurrent and continuing education is occurring within 'open learning' systems, a combination of residential or contact-mode teaching alongside distance education methods and, in some instances, with the assistance of information and communication technologies. This new open learning methodology is particularly appealing to employers and employees. Employers are concerned about the loss of working hours due to staff in training, and therefore approve of open learning methodologies that do not take workers away from production. Employees, on the other hand, are encouraged by the ease of access to part-time study after working hours.

In South Africa this shift to more open, massified and lifelong learning in FET has only just begun. It will require great inputs from the state, the private sector and from communities and learners themselves. In short, it is a responsibility that must be shared by all stakeholders involved, for it is only on this basis that the necessary massification of the system – a central prerequisite for economic development and social equality – can occur.

2.5.3 Constructing the new citizen

Apartheid was based fundamentally on the denial of citizenship to the black majority in the land of their birth. In the absence of a single citizenship, South Africans were governed during the apartheid years by a coerced acceptance of separate identity, culture and education. The social void this created has been massive. South Africa became a highly fractured society divided by race, class, gender, language, culture, religion and locality.

The inheritance of such a divided society has led to a resolute determination by the democratically elected government to use education and culture generally, and FET specifically, to facilitate the forging of a 'new citizenship' based on the following precepts: non-racialism, non-sexism, democracy and a common national identity. But perhaps the most important component of this new citizenship is the transformation of our people from apartheid-induced acquiescence and rote-learned passivity to citizens who in their future workplaces and communities can simultaneously become

- on the one hand, autonomous, creative, innovative and critical thinkers; and,
- on the other, multi-skilled team players capable of working effectively with others in groups and able to perform a range of functions.

These are precisely the key ingredients needed for participation in a successful democracy and competitive economy.

2.5.4 New 'state-citizen' relationship: from entitlement to accountability and effective performance

A further development in the socio-political transformation affecting South Africa along with many other countries across the globe in the late twentieth century has been a shift in the understanding of the role of the state away from what has been termed 'statist', 'social welfare' or 'entitlement' models (states that are viewed as providers-of-all) to a new state-citizen relationship based, firstly, on greater state accountability and effective performance in the delivery of services paid for by taxpayers, and, secondly, on a more conscious effort to make the delivery of FET (as with other social services) a joint cost-sharing endeavour between the state, business and the people.

The culture of 'entitlement' associated with former welfare and statist societies has given way (often after heated political contestation) to a new emphasis on performance and quality indicators that provide evidence of state institutional efficiency and cost-effectiveness. These changes have impacted profoundly on the FET band because it is this sector more than any other educational band that requires the joint efforts of all stakeholders for its success and effectiveness. A successful FET system is unlikely to emerge if it is dependent entirely on state patronage and funding. Rather, it requires the dynamic and creative efforts and the sharing of FET costs among all businesses, civil society organisations and participating individuals. It is these latter groups who today expect the state to make effective use of its budget allocations to FET. The state is increasingly being made accountable by these groups for its financial transactions. In turn, the state requires of all institutions funded by it to provide proof of their cost-effectiveness, efficiency

and quality of delivery. Centralist understandings of the state's role have thus given way to notions of 'state steering' based on incentives and rewards for those institutions that meet strategic targets, attain effective performance levels and provide high quality service. Chapter Three will outline how this new view of the state has profoundly reshaped the thinking about the delivery of FET.

Citizens, too, must cultivate a changed relationship with the new state. The provision of FET skills and competencies is now not considered the responsibility of the state alone but, rather, a joint venture between the state, business and individual learners to acquire the skills needed for economic and social stability at the turn of the twentieth century.

2.6 GLOBALISATION: THE SOCIO-ECONOMIC PRESSURES FOR CHANGE

The economic pressures acting on FET today are substantial and complex. Perhaps the most significant of these is the economic phenomenon known as 'globalisation' and the requirement it imposes on our national economy to respond – in terms of trade, technology and skill – to a rapidly changing world economy. The next section will outline the main features of globalisation and how it is transforming the skill requirements of world-class production. South Africa's chances of succeeding in this task are then examined. It is argued that the country's recent economic history as an inward-looking, import-substituting economy, along with a highly differentiated economy, places considerable barriers to globalisation's rapid advance. The section concludes by arguing for a multi-pronged response to the economic pressures currently placed on FET.

2.6.1 Phenomenon of globalisation

Globalisation can best be understood to refer to the major changes that have taken place in the manufacturing sectors of most economies in the world. Competitiveness in the 1945-1970 era was based on the mass production of standardised goods, cheap raw material inputs, and low-skill, low-wage labour. However, the economic crisis of the 1970s, along with the advent of information technologies, the internationalisation of finance capital and the rise of innovative forms of work organisation in the early 1980s witnessed the birth of a new economic system known as 'flexible specialisation'. This new production paradigm is characterised by the manufacture of high-quality exports aimed at specific 'niche' consumer markets. Innovation and the ability to reinvent products continuously and add value to existing designs are at the heart of the new system. Continuously evolving new car designs, innovative electronic consumer goods and new technological breakthroughs are some of globalisation's most representative symbols.

This new competitive environment has brought with it new education and training demands, for example the need for a highly skilled labour force able to employ the new technologies and add value to existing goods and services. However, it is not merely high skills that are needed but also more well-rounded and diverse skill competencies. Enterprises require labour forces that are sufficiently skilled to adapt to unpredictable and volatile global product markets and rapid technological change. They require broad problem-solving skills to anticipate flaws in production. Workers need to understand how the new technologies can be optimally applied, how the entire production process unfolds, how environmental context shapes the execution of tasks and how unexpected factors

can arise. It is the ability to retool and respond quickly to rapidly changing market conditions that is greatly valued. Only the ET system can provide these capabilities through high levels of generalised yet unspecified skills that exceed those currently needed, but which in future will be in great demand. Writers have referred to these generalised capacities as 'skill portability' and 'learning power'. 'Portability' is the capacity to carry a substantial portion of skill from one work context to the next. 'Learning power' is defined as the ability to deepen and widen skills independently in the post-school years. These two qualities cannot be satisfactorily developed outside general education and certainly cannot be developed in narrow enterprise-based systems of training. Acquiring these multi-functional skill capabilities constitutes the only means to cope with the uncertain skill demands of tomorrow.

The need for high skills also arises as a result of the need for teamwork and multi-skilling at enterprise level. Workers today increasingly work in teams responsible for complex manufacturing tasks. This represents a huge shift from the Taylorist traditions of the past where workers were allocated narrowly defined tasks leaving them ill equipped to understand and hence improve the total production environment. Teamwork requires skilled workers capable of working in varied environments across traditional management, supervisory, design, production, quality control, maintenance, marketing and sales line functions. Workers in today's competitive manufacturing environment require knowledge of all these functions. A good general education throughout the working population followed by dedicated in-service training is the best preparation for this multi-functional skill requirement.

2.6.2 South Africa's partial entry into the world economy

South Africa's adaptation to this new world economic order has been slow and partial. This has been the case for a number of reasons:

- *Import-substituting industrialisation*: Local manufacturing is ill prepared to adapt successfully to 'flexible specialisation'. The roots of this problem can be traced back to South Africa's import-substituting industrialisation strategies (the application of import tariffs and state support for the production of locally made goods). These policies were introduced from the 1920s onwards to nurture the development of infant local industries. They laid the foundations for the economic boom period of the late 1950s that lasted throughout the 1960s into the early 1970s. However, this economic miracle had feet of clay. While GDP grew at a healthy rate of approximately 5% throughout the 1950s and 1960s, this growth rate plummeted during the 1970s and 1980s to a mere 1,1% in the 1980-1985 period – with individual years showing negative growth. Much of the blame for manufacturing's decline has been laid at the feet of import-substitution policies. These policies were essentially inward looking, feeding off a small local market of white consumers. Given the low wages paid to black workers, this strategy was unable to translate into a mass market that incorporated the black population. In addition, because of the narrow local consumer market, the production runs of locally produced goods have never been of the magnitude to benefit optimally from economies of scale. Shielded by import tariffs that did not expose local products to healthy competition from higher quality global goods, there was no incentive for local manufacturers to develop a higher skills base and higher quality products. In short,

tariff protection has shielded local manufacturers from international competition leaving them seriously underprepared to enter the global market place on a competitive footing (Kraak, 1996; Gelb, 1991).

- *Continuance of mass production*: The partial impact of globalisation can also be traced to the smallness of South Africa's high-skill, high-tech manufacturing sector, and the presence of other, more numerically significant economic sectors (in terms of employment and contribution to GDP). One such sector has been the mass production industry with its heavy reliance on semi-skilled and skilled artisan labour. The mass production industry emerged as a dominant sector in the local economy only during the 1960s – much later than was the case in the USA, UK and Europe. Mass production therefore still characterises much of local manufacturing today. South Africa has not yet made the great leap to high-skill 'flexible specialisation' in any meaningful way.
- *The decline of manufacturing and the rise of the services sector:* Flexible specialisation's impact in South Africa is not limited simply because it is confined to a small, high-skill segment of manufacturing. Its growth is constrained by the fact that the manufacturing sector itself has been contracting since the late 1970s. Fewer enterprises and fewer jobs characterise the sector. This decline stands in sharp contrast to the growth in jobs in the financial and services sectors, although most of these new jobs tend to be low skill and clerical. Nonetheless, the significance of these recent developments is that large-scale job creation strategies need to be sought in the growth areas of tourism and other service sector industries – and not solely in manufacturing.
- *Imbalance between the rise in high-skill jobs and the decline of low-skill labour:* Globalisation often leads to the displacement and

retrenchment of low- to medium-skill labour made obsolete by the rapid advances in new technologies without equivalent growth in new jobs at the high-skill end of the occupational spectrum. As a result, labour market changes brought about by globalisation often have the effect of expanding the informal sectors and increasing the ranks of the unemployed. This process appears already to be under way in South Africa.

2.6.3 *Globalisation's double-edged impact: growing the peripheral economy*

South Africa's entry into the global information economy is complicated by the fact that South Africa is a developing society with a large underdeveloped rural economy, a growing informal sector and a mass of unemployed people coexisting in the shadows of the formal urban economy. Globalisation has a double-edged impact in this context: It has the effect of marginalising and impoverishing these economies even more acutely than they were during the colonial and post-independence era. This is because the low state of development of science and technology (S&T) infrastructure in most developing countries has widened the gap between developed and developing economies.

South Africa has acquired a highly skewed economy with a minority (perhaps only 30%) of its people experiencing formal employment. The majority of citizens find themselves systematically excluded from the benefits of full employment and urban life. Some survive off the informal economy. Many are unemployed and reside in the rural countryside. Assessed against this background, world-class manufacturing has little role to play in these local economies beyond the limited possibility of outsourcing certain economic activities from the formal sector to SMMEs.

Even within the formal economy the rapid pace of technological advance is having devastating implications in some contexts. It is hastening the worldwide drift away from unskilled and operative labour towards intermediate and high-skill employment. Its impact is very uneven across the globe. Automation and other technological innovations have displaced many unskilled and semi-skilled jobs, leaving hundreds of thousands of workers unemployed. However, the new technologies have also led to the creation of many new intermediate and high-skill jobs in the fields of information technology, artificial intelligence, telecommunications, genetic engineering, biotechnology, microelectronics and advanced materials design. It is in these new fields where high-skill levels and the ability to generate and manipulate new knowledge and new technologies are critical.

The aggregate impact of this dual process of declining unskilled and semi-skilled labour alongside increasing intermediate and high-skill jobs is socially devastating in some countries with high levels of unemployment and too few new jobs. In certain contexts, notably Western Europe and the Pacific Rim, the changes have been better managed with state and market resources redirecting and retraining obsolete labour away from declining sectors towards new and emerging fields.

In short, the impact of globalisation on the South African economy cannot be viewed as an uncomplicated or benign transition to high-skill, high-tech manufacture. Rather, it is a highly differentiated process with many sectors remaining unaffected or severely disadvantaged by the radical changes it ushers in.

2.7 NEED FOR A MULTI-PRONGED STRATEGY

These highly divergent economic conditions suggest that a multi-pronged economic and ET strategy is required. Firstly, globalisation

should be accepted as an unavoidable reality even though its benefits are largely confined to a relatively small subsector of manufacturing. Secondly, the possibilities of reshaping and moulding globalisation to local conditions should be emphasised – globalisation should not be read as a predetermined and irreversible process. There is still significant space for local agency to determine the course of economic development. This has been the case with the Pacific Rim countries which, despite being temporarily subject to the vagaries of world financial markets, have fared exceptionally well under globalisation precisely because they have shaped their own destinies through effective national economic and human resource development policies.

There is also a significant responsibility on the part of economic and ET planners to develop strategies that address the needs of the marginalised SMME sectors and the informal and rural economies. In addition, the benefits of growth in the formal economy need to be woven into the development policies implemented in the informal and SMME sectors. The advantages of the new technologies, appropriately adapted, should also be extended to these impoverished sectors. The fruits of export-led growth will need to be redistributed to these marginalised sectors through effective state 'supply-side' steering mechanisms aimed at stimulating growth and social development.

The FET band has important contributions to make in the realisation of these economic and social goals. On the one hand, it can contribute in important ways to the development of an export-led and globally competitive manufacturing sector through the education and training of a highly skilled and innovative workforce. But the widely differentiated character of South Africa's economy imposes a range of additional responsibilities. The latter involve meeting the complex needs of marginalised communities excluded

from the benefits of the formal economy. The FET sector is a key instrument available to the state to address these needs – in terms of the programmes they offer, the people they train, and the community development initiatives they facilitate.

Endnote

1 This chapter is a longer version of Chapter Two of the Green Paper on FET. The author was a member of the writing team for the Green Paper and wrote this chapter as well as the abridged Chapter Two of the Green Paper.

Chapter 3

PLANNING IMPERATIVE: NEW POLICY FRAMEWORK IN FET

Andre Kraak

3.1 IMPORTANCE OF THE FET SECTOR

In the past decade profound social, economic and political changes have taken place worldwide which have thrust the FET sector onto centre stage. The FET band, which in the past was marginalised from the educational mainstream, is now positioned to become a central instrument for societal reconstruction in many societies across the globe. This new role has arisen primarily because of the global transition towards a knowledge or information-based economy.

The FET band is critical to the development of the information economy because of its location at two important societal intersections. Firstly, more than any other education and training sector, FET is at the intersection of a wide range of government policies that are critical to the new information economy: macroeconomic, industrial, labour market and human resource development policies. The success of these interdependent govern-

ment programmes is premised on the development of human capacities and skill that only the FET band can satisfy at the scale and levels required.

Secondly, FET is also at the crossroads between GET, HET, work and community and personal life. FET will become increasingly central to the achievement of lifelong learning by facilitating and encouraging learners along the qualification ladder stretching from general through further to higher ET, with learners commuting back and forth between the world of work and the multiple places of learning that constitute FET.

However, FET is currently not receiving the status and financial support required for it to fulfil the roles proposed above. The Green Paper on FET presents a strong case for the prioritising and repositioning of FET:

> Transforming FET to meet the challenges of the present and the future will not be an easy task. It will entail changing public perceptions and attitudes regarding the FET band. It will require rethinking and reinterpreting the dominant positions which both GET and HET currently occupy in the political economy of educational reconstruction. Some of the country's best minds, resources and funds will need to be redirected to the FET sector. We need transformation on a major scale. Such an intervention cannot come from the state alone but must involve all stakeholders and interest groups. Transformation will require more effective state co-ordination, greater private sector investment and involvement, and greater community and individual initiative. The transformation of FET is a project which must succeed, and to which we must all be committed (DoE, 1998a:5).

3.2 NEED FOR SYSTEMIC COHERENCE

Chapter Two highlighted the deficiencies in the FET band. The most fundamental of these is the absence of a sense of system in a band that caters for four very different types of institutional providers and three very different categories of learners. The boundaries between these differing subsectors of the FET band have historically been rigid and impermeable, having involved

> ... the age groups concerned and the purposes for which education and training are provided; with differences in sources of state, private sector, individual and donor funding; and with differences in terms of legitimate stakeholder interests and locus of control – the interests of parents, for example, in formal schooling, and of employers with respect to training, and the roles of the Departments of Education, school governing bodies, college councils and the Department of Labour with respect to the governance of education and training (NCFE, 1997:85).

The state has responded to these problems by producing and publishing a range of policy documents in the 1997-1998 period as was outlined in the introduction to Chapter One. The state's solution to the problems, as articulated in the four key FET policy texts cited in Chapter One, has been twofold. Firstly, the NQF will play a key role in unifying this previously divided sector through a laddered qualification structure that will encourage articulation and transfer across the previously impermeable boundaries of the FET band. But more importantly, the policy documents propose a new regulatory framework that will co-ordinate the band as a single coherent whole, applying uniform norms and procedures with sufficient flexibility to allow for diversity in addressing the multiple needs of very different learner constituencies. The NCFE aptly

described this seemingly contradictory duality (regulation and flexibility) as 'bringing coherence to a necessarily differentiated field' (NCFE, 1997:87). It is for these reasons, then, that the most important recommendation contained in the new policy framework for FET has been the call for a 'single nationally co-ordinated system of FET'.

3.3 SINGLE NATIONALLY CO-ORDINATED SYSTEM OF FET

At the heart of the idea of a single nationally co-ordinated system of FET is a strong emphasis on state co-ordination that will strategically 'steer' the system via a regulatory framework of financial incentives, reporting and monitoring requirements (particularly with regard to key performance indicators) and a system of programme approval. In line with the notion of co-operative governance, the central state's role will be to manage the system in co-operation with other role players and not through prescriptive fiat and other interventionist mechanisms. The state will govern through a 'softer' regulatory framework that seeks to 'steer' the system in three important ways:

- Through *planning requirements* that will encourage FET institutions, particularly colleges, to outline a distinctive mission, mix of programmes, enrolment targets and overall institutional plan.
- Through the use of *financial incentives* aimed at encouraging FET institutions to reorient provision to address national, regional and local ET needs and priorities.
- Through a set of *reporting requirements* particularly regarding *performance indicators* dedicated to measure, in the spirit of greater institutional accountability, the extent to which the institutional plan and national needs and priorities are being met. In so doing, these performance indicators will be highly

influential in shaping the allocation of the next cycle of financial incentives and awards.

The Green Paper defines 'steering' of the FET system in the following way:

> Government will most effectively carry out its role, especially in as complex and diverse a field as FET, through a strategy of 'steering'. In general terms, this means that government will not seek to direct the system, for example through centralised planning, but that it will guide its development through a range of co-ordinating and consultative mechanisms, incentives, and monitoring and reporting requirements. At the national level, state steering will involve the determination of broad policy, the setting of national priorities and targets, the use of earmarked funding, and the monitoring of performance. At the provincial level, the education authorities will guide the development of the FET system through the determination of provincial policies and goals, consultation with providers and stakeholders, the review and approval of institutional and sectoral plans, the allocation of funds, and the monitoring of performance (DoE, 1998a:73).

3.4 NEW REGULATORY FRAMEWORK

The new regulatory framework is best understood as comprising five key features:

- A new curriculum framework.
- A new funding framework.
- A new governance framework.
- A renewed emphasis on 'strategic planning'.
- Striking a balance between, on the one hand, the planning imperative and, on the other, institutional responsiveness, flexibility and diversity.

Each of these five features will now be discussed. However, it should be noted that implementation of all of these features will clearly not follow overnight. Indeed, the Green and White Papers envisage a phased approach with uneven paces of change across institutions in the sector. The following discussion will conclude, then, by highlighting the massive capacity building programme that will be necessary over a period of at least five years if the new FET strategy is to succeed.

3.5 NEW CURRICULUM FRAMEWORK

The first pillar of the new FET framework is the introduction of a totally new approach to qualifications and programmes, based on the idea of an integrated education and training system that overcomes the historical divides between 'academic and applied learning, theory and practice, knowledge and skills, and head and hand' (DoE, 1998a:27, 34).

The Green and White Papers on FET envisage that all qualifications of the future must incorporate SAQA's twelve critical cross-field outcomes as their key building blocks.[1] These outcomes are the 'contextually demonstrated end-products' (DoE, 1998a:34) of the learning process which incorporate the key multi-functional problem-solving, team-oriented and entrepreneurial knowledge, skills and values that are today considered the critical underpinnings of qualifications across the globe. It is these critical outcomes and capabilities that are considered crucial to the process of successfully positioning our economy and society to meet the future skill needs of the information economy.

The policy documents also argue that the FET qualifications of the future should exhibit sufficient depth and breadth to allow, on the one hand, meaningful specialisation without, on the other, undermining the acquisition of a solid formative general education that is

a prerequisite for the attainment of the 12 critical outcomes cited above. Currently, senior secondary education is too general providing few opportunities for specialisation relevant to the labour market. In contrast, current FET college provision is too narrow, offering in many instances obsolete specialisations with little underpinning general education. The critical issue, then, is one of providing greater choice and diversity underpinned by a sound general education. The White and Green Papers argue that these objectives can be met by SAQA's notion of a qualification consisting of three components:

- *Fundamental credits*: These are considered fundamental to all qualifications and are critical in laying the foundation for all further learning. Communication and mathematical literacy are key elements here.
- *Core credits*: These refer to contextualised generic learning. They are compulsory credits that vary across qualifications according to different work/societal/knowledge contexts. They typically will contain theoretical knowledge and practical applications related to the occupational/professional field of the qualification at the relevant NQF level.
- *Elective credits*: These refer to selected additional credits at specific NQF levels to ensure that the purpose of the qualification is achieved. They will include additional credits in the field of specialisation (depth) or credits outside such a field which broaden the core learning undertaken. The offering of work-related experience will also be accommodated within the elective learning component. Work-based credits will help to smooth the transition from school/college to work (NCFE, 1997:62,63; DoE, 1998a:39-40).

The structuring of the learning programme will become increasingly influenced by 'open learning' strategies. Flexible learning will be

ensured through the progressive accumulation of credits by learners irrespective of site and pace of learning, in multiple modes of delivery with multiple exit and entry points:

> There should be appropriate combinations of learning that are person-based and technology enhanced, at a distance and face-to-face, on the job and off the job, in the community and at institutions, teacher directed and self-paced. Technology enhanced learning offers a range of possibilities, and includes the use of correspondence, open institutions (which tend to have tutors, libraries and other face-to-face opportunities), broadcasting/teleconferencing, networks/multimedia, as well as face-to-face education and training programmes. Increasingly, the distinctions between distance education and contact learning in FET institutions are blurring as more providers consider the incorporation of distance education strategies and resources within their programmes. Courseware, initially developed for learners at a distance, is being used in face-to-face learning, often to provide the practical components of courses. New technologies and new uses of old technologies have often led to innovative combinations of learning strategies (NCFE, 1997:53).

This vision of a more flexible, open and increasingly more resource-based system provides major challenges for senior secondary schools and FET colleges. Schools in particular will be encouraged to pursue greater flexibility and diversity through the formation of partnerships with FET colleges, providers of distance education and industry training boards so as to offer a wider variety of subject choice, enable greater opportunities for resource- and work-based learning, create linkages with the Department of Labour's learnerships, and enable independent self-study. The Green Paper on FET suggests a number of innovative ways of pursuing these goals:

> This flexible approach ... will require the establishment of partnerships between and among schools, FET colleges, industry-based training programmes, providers of social and developmental training programmes and providers of training programmes for small, medium and micro enterprises. An initiative directed at enhancing the relevance of FET programmes to work and self-employment would be an important contribution to economic, social, urban and rural renewal and development. Such an initiative could benefit by being located within the rural and urban development projects of ESKOM, TELKOM, the Department of Labour, the Departments of Public Works, Water Affairs and Forestry, Transport, Public Service and Administration, the local government programmes of the Departments of Constitutional Development and Trade and Industry and the Ntsika Enterprises Promotion Agency, industry training boards and their successor bodies, and social developmental projects of religious organisations, local communities and non-governmental organisations (DoE, 1998a:42).

3.5.1 NQF and a programmes-based definition of qualifications

The National Qualifications Framework (NQF) is perhaps the most important tool in the new FET framework. In the past, learner mobility was restricted by the rigid boundaries that separated the differing subsectors of the FET band (as well as the boundary between the FET and HET bands) and by the terminal qualifications on offer. Similarly, diverse course provision was constrained by a bureaucratically managed, unresponsive and supply-led system of provision. In contrast, the NQF attempts to resolve these constraints by allowing progression and diversity through its credit

accumulation and transfer capabilities. The NQF espouses a philosophy of lifelong learning that envisages learners enrolling for programmes or modular components of programmes at differing sites of provision and at different moments in their learning lives. These learners will accumulate a flexible combination of credits over time that will eventually earn them the award of a qualification.

Allied to the idea of the NQF and its flexible accumulation of credits is a programmes-based definition of qualifications. It is a central proposition in the new policy framework. It is founded on the notion that a programme rather than an institutional focus will result in a greater permeability and articulation across the boundaries between the differing subsectors of FET, and between FET and HET, thereby promoting progression and diversity of provision. With a programmes-based definition of qualifications, the NQF is viewed as 'institutionally blind', privileging no specific site of learning towards a specific qualification. Rather, the NQF encourages the idea of multiple sites of delivery and learning. In so doing, the NQF and its associated concept of a programmes-based definition of qualifications act to encourage maximum articulation and transfer across previously rigid and impermeable institutional and sectoral boundaries (NCFE, 1997:84).

In short, a 'programme' is a course offering available at multiple institutional sites of provision using multiple modes of delivery (distance, face-to-face and open learning) and made up of multiple credit units that can be accumulated by learners over time. These units entail academic as well as vocational foci which when combined holistically in a qualification create a more career-oriented or professional set of competencies which have immediate currency in the labour market and which enhance employability.

The design, registration and accreditation of these programmes are key components of the new planning framework to be discussed

later. Determination of the funding of institutions can be done only on the basis of the mix of programmes the institutions have strategically planned for. Programme registration and accreditation, therefore, become the necessary forerunners of institutional and system-wide planning.

3.6 NEW FUNDING FRAMEWORK

A new funding framework is needed to overcome the limits of the current funding formula. A key limitation is the lack of funding coherence reflected in the differing funding norms that apply throughout the multitude of departments, provinces and institutional types that deliver FET. Other limitations include poor information flow that restricts sound financial planning, financial accountability and informed learner choice (DoE, 1998b:50).

These problems are exacerbated by the addition of a whole range of new demands on funding sources: the funding of redress backlogs; the expansion of provision to underrepresented target groups (especially the unemployed); the funding of new modes of delivery, increased learner support and curriculum development; and, given the demands of globalisation, the development of intermediate to high-level skills among the current workforce. A new funding framework will therefore have to incorporate the following key principles:

- *Greater diversification of funding sources*: The South African government has limited resources to fund the massive reform package envisaged. Hence, the new funding regime will be dependent on cost sharing across all the beneficiaries of the FET system.
- *Increased access*: especially for those groupings previously excluded from the FET band.
- *An effective management information system (MIS)*: This will be

used for deciding on the funding of particular programmes and institutions.

- *Coherence*: This will entail attaining the same level of funding for the same programme irrespective of where it is offered.
- *Responsive, demand-led provision:* Current forms of funding are supply-driven, i.e. where money follows the providers, not the learners, and where institutions are not responsive enough to learner needs or the skill demands of the market. Greater responsiveness and sensitivity to demand factors are critical imperatives of a future funding system.
- *Programmes-based funding*: This is seen as the key to greater responsiveness because it links funding to specific programmes and makes funding levels common across all institutions that deliver the same programme. With appropriate financial incentives for new programmes that are in demand, institutions will more flexibly re-orient their provision towards these new market needs.
- *Efficiency and quality gains*: The aim will be to attain economies of scale through institutional resource sharing, partnerships and mergers. The implementation of more competitive contracts, and the development of annual institutional plans that specify output targets and performance indicators will be encouraged (DoE, 1998a:28, 53-55, 59, 66; NCFE, 1997:133, 160-161).

3.6.1 Formula funding

The new funding framework has three components: formula funding, earmarked funding and student financial aid. The formula funding proposal radically breaks with past funding practices that were largely shaped by supply-side institutional and sectoral factors. In the new environment, institutional type and locale have no role in determining funding levels. Rather, funding in the new policy

environment will be based on an institution's mix of approved programmes that lead to relevant qualifications and credits – i.e. funding will be programmes driven. The key funding unit that will shape the size of the allocation to a FET institution will be based on learner enrolments in a programme expressed as full-time equivalent (FTE) students. This is an input variable that is technically at odds with the output/outcome emphasis of the new FET policy framework. As a consequence, the new funding proposals deliberately seek to link the FTE enrolment figure to a key performance or output-related objective that specifies that 5% of the fund will only be granted once a learner has satisfactorily completed his/her programme' (DoE, 1998a:61).

3.6.1.1 Overcoming funding instability

One extreme implication of the above model is that some ill-performing institutions may receive highly fluctuating or decreasing levels of funding because their mix of programmes is unacceptable to government (for example, because they are in obsolete fields or because there are duplicate course offerings at neighbouring institutions), or because their student performance levels are too low. Instability in funding may also arise if, in the short to medium term, funding were to be linked to the submission of three-year rolling plans as is proposed for HET. This is because the current planning capabilities of FET institutions are currently very limited. A premature transition to such a three-yearly requirement could lead to institutional failure as colleges in particular struggle to meet strict planning criteria. To ameliorate these threats of instability in funding year on year, the new FET policy proposals suggest a 90/10% rule: 90% of the previous year's funding will be guaranteed and allocated whilst 10% will reflect the outer margins of funding

fluctuations which relate to performance-linked successes or shortfalls.

In the short to medium term, senior secondary schools will be exempt from programmes-based funding principles because of the complexity of managing over 7 000 institutional plans, and because of the absence currently of capacity to implement such an approach in schools (DoE, 1998b:25).

3.6.1.2 Competitive contracts

Funding contracts are another essential component of formula funding. Government will 'formalise its relationship with providers in a contract which will set out the levels of funding available, the programmes to be delivered, target outputs, and the information to be provided' (DoE, 1998a:62). Contracts will be issued on a competitive basis, encouraging greater responsiveness from institutions to meet national, regional and local skill priorities. In addition, because the winning of contracts will require institutions to be more pro-active in their delivery of key niche training areas, formula-funding contracts will reinforce the drive towards strategic planning.

3.6.2 Earmarked funding

Earmarked funds are special purpose funds that are top-sliced off FET sectoral funding and then used for strategic purposes. They are intended to provide institutions with additional incentives to meet national skill needs that might otherwise not be met. Earmarked funding will be allocated in the context of fierce competition, which it is argued, 'will help to promote quality and efficiency' (DoE, 1998a:63). Areas already identified as potential beneficiaries of earmarked funding include:

- *Redress*: Capacity-building initiatives such as management and

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staff development as well as the improvement of physical facilities.

- *Strategic priorities*: The implementation of information systems, the development of quality assurance mechanisms, the upgrading of specialised plant and the promotion of intermediate level technical training.
- *Outreach programmes*: ET programmes aimed specifically at marginalised target groups.
- *Piloting and innovation*: Support for creative innovations in curriculum, student and staff development.
- *Partnerships*: Encouragement of collaborative ventures with other FET institutions and role players (DoE, 1998a:63; NCFE, 1997:164).

The application of earmarked funding will occur in two ways. Firstly, it will be built into the normal financial grants to provinces with guidance regarding how these funds should be disbursed. The Minister of Education will draw up the funding norms and standards that will guide the way in which provinces, education MECs and provincial departments of education should disburse the funds in FET.

However, the national Department of Education's ability to steer FET through earmarked funding may be seriously undermined by provincial departmental control of the block grants from the treasury which provinces receive for social services expenditure. In an attempt to strengthen the powers of the national Department of Education in steering the system, a second category of earmarked funding has been defined. It is termed 'conditional grants' that could be given to provinces from the national share. The Green Paper promotes conditional grants by arguing:

> If a conditional grant were earmarked for FET by national government, the Minister, on the advice of the NBFET, could determine the purpose and conditions for its allocation to the provinces. These could include the achievement of specific national priorities, which would be monitored. The leverage of conditional grants could be increased if provinces were required to put up matching amounts from their own resources (DoE, 1998a:64).

It is clear that although the concept is noble, earmarked funding may have undesirable consequences, for example by being overridden by provincial peculiarities at the expense of national norms and priorities (DoE, 1998a:64). Such funding allocations will have to be carefully monitored and guarded. Co-operation between the Departments of Finance, National Education and Labour will be of paramount importance.

3.6.3 User fees

The third source of funding will be user fees. All the FET policy documents stress the need for increasing the extent of cost sharing in FET by expanding state and employer contributions, and through user fees. The policy documents propose a framework based on the ability to pay specifically through the development of progressive fee policies that allow for the reduction or remission of fees for academically successful yet indigent learners (DoE, 1998b:26). The state, through its White Paper on FET, has specifically ruled out the possibility of setting up a fully-fledged loan scheme because of undercapitalisation problems already existing in the scheme for HET students. Government has committed itself to pursue other possibilities, for example a larger contribution to loan schemes and learner bonds from employers (DoE, 1998a:65).

3.6.4 Funding grid, pilot runs and phased implementation

The new policy framework, particularly the new funding norms, are all premised on the development of what is called a 'funding grid' – a three-dimensional matrix combining approved programme fields on the one axis, costs per programme along another, and the total number of students enrolled per programme along the third axis. Such a matrix is dependent on two categories of information flow: Firstly, all syllabi will need to be expressed in programmatic form and registered by SAQA; secondly, all FTE enrolment costs per field will need to be predetermined. Once these prerequisites for effective institutional planning are in place, each college's targeted enrolment figures will be costed and evaluated by the provincial department using the funding grid and then, finally, amended and/or approved. Approval will be determined by provincial and national strategic priorities in those specific fields and the cost-effectiveness of expected enrolment level at that particular college. Duplication or underprovision of particular courses will have to be ironed out between the affected colleges and the relevant provincial departments. Once the institutional enrolment targets have been approved, the college will be delegated its budget.

Coping with such a programmes-based funding model will sorely test the resources of colleges. The policy documents argue for a gradual approach based on the piloting of the new funding procedures and the phased inclusion of colleges ready to accept autonomy and delegated budgets:

> There will be two key steps in the process of delegating budgetary authority to FET institutions. The first step will be a 'dry run' of the strategic planning and budgetary process. Institutions will draw up institutional plans and budgets on

> paper and these will be reviewed by the education departments and FET advisory bodies. Once an institution has satisfactorily completed one or more dry runs and has familiarised itself with the operations of the new funding framework, it will undergo a professional audit of its financial systems and controls. Only when its financial systems, capacity and compliance with other requirements to be determined in the Further Education and Training Act, 1998, have been assessed and certified, will an institution be declared an FET institution as defined in the legislation and granted delegated budgetary authority. Following ... [approval] ... the provincial education departments will allocate funds to each FET institution. A memorandum specifying the purposes for which the funds are to be used and the targets that are to be attained, will accompany each allocation. FET institutions will be responsible for ensuring that they meet the targets agreed to in the funding memorandum and will be required to manage their financial affairs and account for their use of public funds (DoE, 1998b:34).

As is obvious from the processes outlined above, the participation of institutions in the above processes will require sophisticated planning, financial management and management information systems. The concluding section of this chapter will elaborate on the extensive capabilities which are now required but which are currently absent in the present system.

3.6.5 Overlap with the Department of Labour's Skills Development Strategy

The Department of Labour's *Skills Development Strategy* makes provision for the introduction of a levy-grant funding scheme (a tax of 1,5% of payroll) that will provide the state with critical leverage

in the economy and in the formation of skills which it previously did not have. Firstly, through the 80 percent grant re-allocated to industry Sector Education and Training Authorities (SETAs), the state can use the disbursement of these funds to influence the way in which industry training authorities develop and implement their training policies. The Green Paper, *A Skills Development Strategy* proposes that training funded by a SETA allocation should meet certain criteria and fall within four specific categories of training: well-structured and high-quality enterprise-based training; support schemes for small and micro-enterprise training; support for the development of annual training plans; and the promotion of higher entry-level skills through learnership schemes. In addition, the Green Paper proposes that the 20% of the levy-grant scheme allocated to the National Skills Fund will-enable the state to intervene strategically in the economy by prioritising training in the following three categories: training in strategic industry programmes; training aimed at vulnerable social groups; and, lastly, the infrastructural development of the training provider market (DoL, 1997:70-73).

The two Department of Labour (SETA-linked and NSF) funds provide significant opportunities for FET institutions to access additional funding and to participate in important human resource development projects throughout the country. Technical colleges, for example, may compete for earmarked funding controlled by the Department of Education whilst simultaneously applying for funding from the SETA and National Skill Fund kitties. A key area where this funding may overlap is learnership training. Under the allocation funds through SETAs, learnership schemes in industry will be encouraged as a strategic national priority. In addition, the National Skills Fund will also fund the structured learning component of learnerships. Technical colleges and other FET

institutions have a critical role to play in the provision of this particular form of education and training. To succeed, though, they will have to enter into formal agreements with industries that have set up learnership programmes. As can be deduced, the potential for funding incentives to encourage greater industry-college partnerships is enormous.

> The implementation of the Skills Development Act of the Ministry of Labour will have implications of the utmost importance for FET institutions and the provincial education authorities. The Ministries of Education and Labour are examining these in detail. FET institutions must be assisted to engage responsively with the new opportunities to be opened up by the Act. They will need to develop the capacity to offer and manage learnerships made available by the Sector Education and Training Authorities (SETAs) and to launch and sustain programmes that would attract support from the National Skills Fund, directed toward rural skills needs and the learning requirements of the long term unemployed (DoE, 1998b:26).

Managing these dual (Departments of Education and Labour) funding opportunities will be difficult and government will have to ensure that no bureaucratic inefficiencies, duplication of functions or abuse of the system occurs. This issue has already been referred to the Inter-Departmental Committee on Human Resources Development for consideration (DoE, 1998a:64).

3.7 NEW GOVERNANCE FRAMEWORK

Chapter Two outlined the extent of institutional inequality and fragmentation that characterised FET in the apartheid era. The current post-1994 system of FET continues to be highly fractured horizontally (across differing national departments of state) and

vertically (across national and provincial competencies). In addition, many FET institutions offer programmes at HET levels that are governed not by FET rules and regulations but by the norms, and standards that arise out of the new HET governance framework. All these stratifications make the realisation of a truly integrated system of ET extremely difficult. Resolving some of the difficulties and contradictions is the main challenge of the new governance framework. The Green Paper admits that while the new governance measures

> ... fall short of the goal of a fully integrated approach to education and training, [they] seek within the given constraints to bring about greater coherence and co-ordination, through the development of new advisory and governance mechanisms, new strategic planning processes, and a principled and pragmatic approach to system change and institutional development. The Ministry believes that the measures outlined here constitute a significant, and vitally necessary, step in the right direction (DoE, 1998a:73).

Three critical features (defined at the macro-, mezzo- and micro-levels) characterise the new governance framework. The primary consideration of this framework is to reform the system at the macro-level. This entails the redefinition of the role of the state and the market in FET delivery. This role, whilst interventionist in the sense of striving to transform the old apartheid regime in ET, has more to do with strategic 'steering' of the sector and less to do with outdated and discredited models of 'centralised planning'. Steering suggests that the state will guide the FET sector along its development path through a range of co-ordinating and consultative mechanisms, incentives, and monitoring and reporting requirements. At the national level, state steering will involve the determination of broad policy, the setting of national priorities and

targets, the use of earmarked funding and the monitoring of performance (DoE, 1998a:73). State steering will also entail the attainment of a balance between market flexibility and state regulation. System co-ordination and coherence should be achieved in a manner that does not inhibit the key signals from the market which concern employer skill needs and learner requirements. Nor should steering restrict the creativity and responsiveness of FET institutions in attempting to meet these market needs.

A second critical feature of the new governance framework, defined at a mezzo-institutional level, seeks to promote the greater use of partnerships and collaborative efforts between institutions in demarcated regions/provinces to ensure larger economies of scale, cost-efficiencies, shared physical infrastructure and expanded learner choice:

> Co-operative relationships are critical at the institutional level, between FET providers, and between FET institutions and civil society and employer organisations. Partnerships between the providers of FET and 'clients' of the system – in particular, communities and employers – are key to the provision of relevant, responsive FET programmes. Partnerships will need to inform the mission and strategic plan of FET institutions, help shape the programme mix, and influence the design and delivery of FET programmes. In addition, partnerships will be key to mobilising the human, physical and financial resources needed for the revitalisation of the FET system (DoE, 1998a:22).

And finally, the idea of 'co-operative governance' is perhaps a third critical feature, defined at the micro-institutional level, and entailing the inclusion of key social partners and stakeholders in a system of participatory governance. All these features become the key pillars of the new governance environment.

The next section will discuss the details of this new governance environment in the following order:

- *Macro-level change*: the establishment of the National Board for FET and the allocation of key governance functions to a range of political office-bearers in FET.
- *Micro-level change*: outlining three steps on the road to greater institutional autonomy for technical colleges.

The question of mezzo-level change and the restructuring of the institutional landscape at local and regional levels in FET are dealt with in the concluding chapter of this book, Chapter Eight.

3.7.1 National Board for Further Education and Training (NBFET)

One of the most important recommendations emerging form the FET policy process was the formation of a national body to ensure the coherent and co-ordinated regulation of FET. There was considerable debate in the National Committee on Further Education (which reported in August 1997) on the structure of national co-ordination in FET. Two governance models were put forward in the report. On the one hand, the 'concurrent' model argued for equivalent provincial councils for FET which would build on the constitutional proviso that recognised FET as a provincial competency. This model argued that the complexity of the FET band required devolution of control and co-ordination. It was only at this level that regional and local development needs would be recognised and not subsumed under national requirements. The downside of such a model, however, was its prohibitive costs and duplicative structures.

On the other hand, the 'national coalition' model argued for a single dedicated national body which would locate power at the centre and which would give preference to national norms and standards

across all provincial boundaries. The benefits accruing from this model were the concentration of scarce resources, cost-effectiveness and greater administrative efficiency (NCFE, 1997:96-110).

The White and Green Papers on FET as well as the November 1998 FET Act all opted for a watered-down version of the 'national coalition' model. The proposal in the Act for the formation of a National Board for FET (NBFET) discourages the formation of a relatively independent regulatory authority for FET as was the case in HET with the establishment of the Council on Higher Education (CHE). The CHE has its own secretariat and executive management, and is housed independently of the Department of Education. In contrast, the NBFET has been assigned a lesser title in the organisational hierarchy ('board' as opposed to 'council') which symbolises its greater dependence on, and location within, the national Department of Education. Furthermore, whereas the NCFE idea of a 'national coalition' model envisaged a single advisory authority across education and training, which assumed the incorporation of the Department of Labour's National Training Authority (the reformed National Training Board) within a single FET Coalition Council, the 1998 FET Act did not support this move, leaving in place two advisory authorities with powers in FET (the NBFET and the NSA).

The Act views the NBFET as playing a 'leading strategic role in conceptualising and promoting the development of a new, responsive national FET system. The minister will consult the board on the development of the national policy framework for a transformed FET system, the determination of national goals and objectives, the establishment of a regulatory framework and steering mechanisms, and the development of effective strategies for transformation' (DoE, 1998a:76).

Membership of the NBFET will be made up of representatives of key national stakeholder groupings who will be publicly nominated but appointed by the minister in their personal capacities. Cross-sectoral government representation will be obtained via representation from the Departments of Education; Labour; Trade and Industry; Arts, Culture, Science and Technology; and two or three representatives of the provincial Departments of Education nominated by the Heads of Department Committee. Representatives from the CHE, NSA, SAQA and the National Youth Commission will also be appointed (DoE, 1998a:76).

The NBFET is at the centre of a complex national-provincial nexus of statutory responsibilities. Its powers are defined but also limited by this web of inter-linking controls. Table 3.7.1 represents these linkages graphically:

Table 3.7.1: National and provincial levels of responsibility in the governance of FET

Locale of power	Responsibilities in FET
Minister	■ Determines national norms and standards including funding norms, curriculum requirements and quality assurance mechanisms. The minister must report annually to parliament. ■ Determines, by government gazette, the declaration of bodies as 'FET institutions'. ■ Consults with the Minister of Labour to co-ordinate national policy for education and training in FET. ■ Reports annually to parliament on FET.
National Department of Education	■ Provides professional support to the minister and director-general with regard to development of national FET policy. ■ Maintains an effective and up-to-date FET educational management information system (EMIS)

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	■ Co-ordinates a management development strategy for FET. ■ Administers national examinations for FET colleges. ■ Co-ordinates quality assurance functions. ■ Provides guidelines to provincial bodies for the execution of their responsibilities.
NBFET	■ Advises the minister on national FET policy, goals and priorities, norms and standards, including funding norms and the terms, purposes and conditions of earmarked grants. ■ Receives reports on FET from provincial advisory bodies. ■ Monitors and reports annually to the minister on the goals and performance of the national FET system. ■ Analyses and disseminates information about FET.
Provincial MECs of education	■ Determine provincial FET policy. ■ Declare by notice in the Provincial Gazette the establishment, merger and closure of public FET institutions. ■ Approve an 'aggregated plan' for the senior secondary school sector. ■ Determine financial allocations to FET. ■ Approve the establishment of councils, academic boards and SRCs at FET institutions. ■ Approve the strategic plans developed by the councils of FET institutions. ■ Create the provincial educator post establishment and, with the head of department, allocate specific numbers of posts to schools and colleges. ■ Report annually to the provincial legislature.
Provincial departments of education	■ Provide professional support to the MEC. ■ Allocate funding to FET schools and colleges. ■ Administer FET schools. ■ Develop an 'aggregated plan' for senior secondary schools in the province.

	■ Approve FET college 'strategic plans' after taking into consideration the advice of the provincial advisory bodies. ■ Enter into specific funding contracts with each FET college on the basis of its plan. ■ Maintain an effective EMIS in each province.
Provincial advisory bodies	■ Advise the MEC on the implications for the province of national policy. ■ Prepare an annual report on FET. ■ Consider the NBFET annual report on FET. ■ Monitor the performance of the provincial FET system. ■ Advise the provincial DoE on the approval of college plans. ■ Review the 'aggregated plan' for senior secondary schools in the province. ■ Publish and disseminate information on FET.

This complex nexus of relationships between the national and provincial education ministries and departments and between the NBFET and the provincial advisory bodies on FET has the effect of moderating the impact and diluting the coherence of a centralised board for FET. This dilution is a function of the country's new constitution that subjects FET to a range of concurrent powers across three key axes:

- The national Department of Education is ceded the responsibility for defining national norms and standards in FET.
- However, policy implementation in FET is a provincial competency that affords the nine provincial departments of education a high level of control over the FET sector.
- The national Department of Labour has regulatory powers over all publicly funded industrial training schemes such as the apprenticeship system, and over all enterprise-based training.

The discussion on funding earlier in this chapter noted that the powers of the national Department of Education to steer FET in the direction of a single coordinated system through financial and other incentives may be seriously undermined by provincial department control of the block grants that provinces receive for social service expenditure. For example, funding incentives for good institutional planning undertaken against the background of nationally determined norms, standards and priorities may be of no consequence if provincial department allocations to technical colleges ignore such incentives. Already, there are strong indications of different approaches to FET in the nine provinces, none of which has been guided by national policy principles. A good example of this trend is the rapid conversion (in some instances) of technical and teacher training colleges into community colleges. In addition, the idea of a truly integrated education and training system and the success of innovations such as the 'learnership' scheme are compromised by the absence of close collaboration between the national Departments of Education and Labour.

At best, the new governance powers ceded to the NBFET are voluntarist and depend to a large extent on the degree of co-operation and consensus between the differing departmental and provincial interests represented on the NBFET. Whether these powers will be sufficient to drive change in the FET band is as yet unknown. What is certain is that a heavy burden now rests on the national Department of Education to take the lead and define a 'hegemonic' view of FET which must become irresistible to unconvinced provincial education department officials. Policies will not succeed if they are forced on reluctant provinces. In short, the key role of the NBFET will be to forge a dynamic policy consensus among a large number of players who come to the negotiating table

with a wide array of competing and sometimes contradictory claims on scarce resources in education and training.

3.7.2 Three steps on the road to institutional autonomy

Profound changes are also proposed at the micro- or institutional level in FET. The new policy framework proposes that FET institutions should progressively acquire greater institutional autonomy. With specific reference to technical colleges, the main focus is to collapse the apartheid-created distinctions between 'state-aided' and 'state' colleges by reclassifying them as publicly funded colleges to be governed by councils with the same statutory authority.

The policy documents envisage a three-phase developmental approach to autonomy, whereby institutions with differing capacities can move progressively towards full autonomy. The three major developmental phases are:

- *Step one: The allocation of (first-level) governing powers*: The FET Act of 1998 makes provision for the establishment of governing councils at all technical colleges. Such councils will have strong stakeholder representation with powers to develop strategic plans and mission statements for the institution, address racial and gender imbalances, determine language policy, and align the institution's qualifications with the NQF (RSA, 1998:14). In addition, such a council will also determine admissions policy, internal disciplinary procedures, the selection of staff and the fulfilment of all fiduciary/legal requirements (DoE, 1998a:82). The Act also makes provision for the establishment of academic boards (with responsibility for determining the instructional programmes and quality assurance procedures) and student representative councils (to give expression to the interests and

concerns of students, and to represent the student body on the academic board and college council). Many state-aided colleges currently possess these powers and bodies, and consequently, Step one will be mainly of significance for the current state-run colleges (DoE, 1998a:82).

- *Step two: Developing planning capabilities*: Each college council will need to acquire substantive strategic planning capabilities in order to develop its institutional mission and distinctive 'niche' area of service delivery, which together will define that institution's specific relationship with the local and regional economy and society. The college council will need to develop clear institutional goals and plan for the most appropriate mix of programmes which, firstly, should be responsive to local and regional needs and, secondly, should be, competitive in a programmes-based funding environment, and which, therefore, should acquire the most optimal sources of funding. In short, college councils will need to undergo a substantial paradigmatic shift from the bureaucratic mindset which predominates today and which is strongly influenced by supply-side considerations, to a strategic planning logic that is sensitive and responsive to market conditions and learner needs. The acquisition of such capabilities will be very uneven across institutions and will need to be nurtured through capacity-building programmes. The 1998 National Business Initiative (NBI) study on Gauteng technical colleges elaborated on the demands of this planning imperative by noting that the new governance framework in FET required colleges to move

> ... beyond traditional conceptions of their role in technical and vocational education, and review their mission and goals in relation to the needs of identified target audiences and market niches. Institutions will need to become more

flexible and responsive, with a strong emphasis on open learning and lifelong education. They will need to become strongly client orientated, and place greater emphasis on learner support services, community outreach, the provision of a range of services to industry and to communities, and on marketing themselves to current and potential clients (Fisher, Hall and Jaf, 1998:59).

- *Step three: Devolving financial responsibilities to the local level – acquiring delegated budgets*: The new policy framework with its overarching planning imperative requires institutions to move along a complex capacity-building pathway towards greater institutional readiness for full autonomy. Firstly, institutions will need to align their mix of programmes to meet national, regional and local skill priorities. Secondly, institutions will need to pilot 'dry runs' of their chosen 'programme-funding' configurations. Thirdly, institutions will need to undergo a professional audit of their financial systems and controls. By completing all three of these steps, an institution will have demonstrated its ability to manage its own budget. Once this elaborate process has been completed an institution can then be declared a 'FET institution' as outlined in the 1998 FET Act. This declaration opens the final door to acquiring delegated budgetary authority (DoE, 1998b:34). Only once a funding contract has been signed (between the provincial education department and an institution, which spells out the specific programme-funding arrangements and the award of delegated budgetary authority) can the institution be considered as having attained fully autonomous status. Attainment of such status will be differentially achieved given the highly uneven spread of institutional capacities.

3.8 PLANNING IMPERATIVE

It is now evident from the discussion above that fundamental to the new qualifications, funding and governance frameworks is an all-pervasive 'planning' imperative. The NCFE report argues that a single co-ordinated system is not realisable in the absence of strategic planning:

> Strategic Planning at the provider level, guided by national and provincial FET strategies and informed by the demands and opportunities presented by the local social and economic context, is [a key pillar] of the co-ordinated approach to FET... Without strategic planning at the level of colleges and the senior secondary school system, and without measures to encourage strategic planning in the private sector, the development of a coherent and responsive FET system ... will not take place. And without a national FET strategy, augmented by provincial strategies, institutional strategic planning will tend towards fragmentation, inefficiency and duplication, and the persistence of inequalities at the systems level (NCFE, 1997:123).

In summarising this planning thrust which pervades all of the policy documents on FET, five key components can be identified:

1) *An aggregate plan for senior secondary schooling:* A plan will be drawn up by each provincial education department which should set out clear priorities with respect to programme mix and delivery of FET in schools. The plan should indicate the uses to be made of earmarked funding, for example in the provision of seed money to initiate school-college partnerships. In short, the intention with an aggregate plan is to avoid forcing each school to draw up strategic plans (a capacity many schools do not have), but rather, at a provincial level, to attempt to redirect senior

secondary schools to establish closer links with career education and vocation training so as to provide students with some exposure to the world of work (NCFE, 1997:124). Such an aggregate plan would then be submitted to the provincial advisory body before approval by the relevant MEC and referral to the NBFET for further consideration.

2) *College institutional plans:* A key feature of the new FET framework as regards college provision is the drafting of institutional strategic plans. They are intended to promote responsiveness, provide a basis for effective institutional planning, reflect the distinctive mission of the institutions, provide a practicable framework for its realisation; and identify 'niche' areas of provision. College plans will need to address the question of identifying and meeting local and regional social and economic needs through appropriately customised ET programmes. This will require a high degree of consultation with local stakeholders and the utilisation of local, regional and national labour market data and economic trends in the drafting of institutional plans. Colleges will also be expected to address the needs of the informal economy and impoverished neighbouring communities, both requiring decentralised labour market research instruments – capabilities most colleges do not currently possess. Earmarked funding will be set aside to develop these capacities in each of the colleges in the medium term. It is also proposed in the policy documents that this new approach to institutional planning be phased in over a five-year development period (NCFE, 1997:1236; DoE, 1998a:92-93).

3) *Involvement with the training programmes of the Department of Labour:* College plans will have to demonstrate familiarity with the training programmes and funds available through the *Skills*

Development Strategy. Substantial opportunities exist for colleges to participate in and benefit from the development and training of learnerships, the production of skills for new high-tech industry and other industrial growth points, and in assisting industry with its enterprise-based training needs – all of which will provide colleges with additional sources of income obtainable from the Department of Labour's levy-grant scheme and National Skills Fund.

4) *Programme mix:* Colleges will have to indicate the exact mix of different courses and the number of student places to be accommodated in each programme in a manner which is sensitive to the social and economic needs of the local and regional communities, and which optimises the utilisation of available lecturer expertise and infrastructural resources. Key factors that need to be taken into account in the determination of this mix include institutional capacity, redress considerations and questions of demand and supply (NCFE, 1997:125).

5) *Developing the 'funding grid' and piloting the delegation of budgets:* Earlier sections of this chapter outlined the complex planning entailed in the new funding framework. At its heart are five sequential steps that include the following:

- Developing management capacity to undertake strategic and financial planning.
- Devising adequate information systems at all levels.
- Developing a qualifications system that is programmes based. All FET qualifications will have to be expressed in programme format and registered on the NQF by SAQA before programmes-based funding calculations can be operationalised.
- A 'funding grid' should be developed using the programme and cost information obtained from the above steps.

- The progressive delegation of control over budgets and other spheres of autonomous governance should be implemented as institutions demonstrate competence to govern autonomously (DoE, 1998a:67).

It is clear that each sequential step is a prerequisite for the next. This strategic approach to funding will require sophisticated planning, financial management and management information system skills – many of which are not present in the current system.

3.8.1 Key instruments of state steering

A number of key steering instruments emerged in the above discussion. They are visually represented in tabular form below. It is evident that the state has several powerful instruments with which to steer the future FET system.

Table 3.8.1: Key steering instruments of the new FET regulatory framework

Central pillar	Steering instrument	Regulatory logic
New curriculum framework	1) Programmes	State steering via the registration, accreditation and approval of the programmes and the mix of programmes offered by institutions.
New funding framework	2) Funding grid 3) Earmarked funding 4) Formula funding	State steering via the application of the 'funding grid', the allocation of earmarked funding, the approval of institutional funding based on the mix of programmes (formula funding) and the approval of conditional grants to provinces.

New governance framework	5) Institutional plans 6) Reporting requirements 7) Monitoring of performance 8) Mezzo- and macro-level strategic planning and advice	State steering via the devolution of planning and financial management responsibilities to the (micro) institutional level, encouraging greater institutional responsiveness to market needs. In addition, college councils will need to be accountable to government by publishing regular reports on institutional performance. And lastly, strategic planning will be undertaken by the provincial advisory bodies and the NBFET.

3.9 PLANNING AND RESPONSIVENESS

A policy framework that emphasises co-ordination and flexibility/diversity may at first appear contradictory. However, given the wide array of future clients of the FET system and the need for a multi-pronged strategy to address all these needs, co-ordination and flexibility/diversity are indeed complementary strategies.

This duality arises also because of the bureaucratised forms of provision in FET in the past where programmes 'were offered more because of the availability of staff and equipment than because of any clear identified need' (NCFE, 1997:91). This inept 'supply-side' provision has led the reform process to stress more market-oriented and competitive forms of delivery within a broader movement towards national co-ordination and coherence in FET. Co-ordination, as it is understood in the new FET policy environment, is about state steering and the effective balancing of state (supply-side) measures alongside demand-led initiatives at local level. It is about

creating an enabling environment for local initiative to take place. College councils, in determining their institutions' responsiveness, will need to identify the appropriate mix of programmes and 'niche' areas that will satisfy local needs and requirements. The Green Paper strongly supports these arguments for diversity:

> This Green Paper supports the development of a college system which recognises diversity, concentrates scarce resources for maximum cost-effectiveness and impact, ensures within an appropriate institutional framework efficient and effective provision for specialist as well as general education and training, and responds meaningfully to the varied needs of individuals and communities. Determining the appropriate institutional arrangements for ensuring diversity of provision is best effected at the local level. This means, in the first instance, that the governing body of each FET college must decide on the institutional model and form which is best suited to the fulfilment of the institution's mission and the achievement of its strategic plans .... Within this broad mandate some colleges may choose to focus their energies on self-employment, small business, entrepreneurial, community development and self-improvement programmes relevant to their local communities. Other colleges, more closely integrated into the formal economy, may concentrate on the provision of intermediate to high-level skills required by an increasingly export-competitive manufacturing economy. The different institutional missions and relationships to the economy will evolve in local and regional contexts, driven by local and regional needs. Access to HE will [also] continue to be an important strand of FET college provision (DoE, 1998a:16, 25).

A key feature of the debate on diversity of provision is the emphasis on meeting the training needs of groups traditionally excluded from the FET system – marginalised categories such as rural women, youths-at-risk (in prison, militarised or homeless) and the unemployed. For example, the White Paper makes a strong plea for addressing the ET needs of out-of-school youth:

> Investing in our youth means investing in our future. The Ministry recognises that the inherited poor quality, the lack of relevance of much of schooling and the collapse of the youth labour market are critical social, economic and educational problems facing our young democracy.... Many [young people] are at risk of being permanently unemployed and forced to eke out a living on the margins of society. Our FET policy must directly address the transformation of the senior secondary school system, the present technical colleges and community colleges, and the development of new, meaningful education and training opportunities for young people outside formal education. The widening of participation in FET must also include working adults and those of our people experiencing long-term unemployment ... For many young people, the flexibility, programme diversity, facilities and support services that a revitalised FET institution with an open learning environment could offer, are likely to be greatly preferable to secondary school environments, especially for those learners faced with repeating a year of full-time study. The Ministry is committed therefore to the development and expansion of high-quality, flexible, innovative FET institutions, based on the principles of open learning and responsiveness to the needs and demands of all post-15 learners (DoE, 1998b:6-7).

3.10 INCREMENTAL CHANGE AND CAPACITY BUILDING

The transformation of FET will throw up a whole batch of new roles and responsibilities concerned with devolved governance, strategic planning and more competitive funding arrangements. These developments place enormous pressures on middle to senior management and academic staff in FET institutions who are currently struggling to fulfil existing obligations given the severe resource and capacity constraints endemic to the sector. For this reason, the Green and White Papers on FET argue for a phased developmental approach to the transformation of the sector:

> In beginning to implement a [human resources development] strategy, it is important, first, to match the capacity of government and the FET system to the roles assigned to them, and second, to begin to build capacity at the system and institutional levels. This implies that implementation of a co-ordinated approach to the transformation of FET will need to take place in phases, as the necessary mechanisms and processes are put in place, and as the necessary capacity is developed (DoE, 1998a:92).

The Green Paper on FET identifies four key areas of capacity development and argues that the funding framework will need to recognise these areas for future earmarked funding. They are:

- *Management capacity must be developed:* Included in this category is the development of effective management and leadership skills particularly in the technical college sector and in the FET divisions of the provincial and national departments of education. It also includes the development of MIS; the acquisition at the college level of skills in strategic planning and financial management; and the development of student

information, counselling, admissions and placement services. The capabilities of members of college councils and school governing bodies will also need to be developed given the increasing strategic planning and financial management responsibilities they will carry in the future.

- *Changing organisational cultures:* The NCFE report and Green Paper on FET both highlight the predominance (particularly in the technical colleges) of a poor work ethic characterised by 'authoritarian management, hierarchical work organisation, rule-bound and unimaginative work practices and demotivated staff' (DoE, 1998a:85). Low morale tends to 'increase conflict, limits capacity and quality output, and undermines organisational energy for evolutionary change and development' (DoE, 1998a:85). Manifestations of this lethargy are reflected in the 'lack of curriculum updating, static methodology, conventional work patterns and an inability to deal with fast changing technologies' (NCFE, 1997:187,188). Transforming these conditions will require more than structural change: it will require change in the affective domain – a change in values and aspirations and a rejection of the negative stigma associated with vocational education and training in the FET band.

- *Academic staff development:* Academic staff development, particularly in the technical colleges sector, is almost non-existent. Strategies will have to be developed to foster the professional development of teachers and lecturers in FET. Training in curriculum development, the development of learner materials and innovative teaching methodologies will all be priorities. Academic and management staff will also need assistance in acquiring the skills of forming partnerships and engaging in collaborative research and development with the private sector and neighbouring communities.

- *Building the physical infrastructure:* Apartheid distributed physical and other assets inequitably between institutions. Redress strategies will have to be considered to equalise these resources across colleges. In addition to this backlog, certain institutions have failed to keep up with developments in information technology – these technological gaps will need to be closed.

3.11 CONCLUSION: A TEN-YEAR DEVELOPMENT PROJECT

All in all, the changes envisaged are enormous. The ministry argues that this change process will take at least five if not ten years:

> The Ministry believes that the establishment of a national policy framework for the transformation and development of FET is a pressing national concern. At the same time, it recognises that the introduction of a new planning, regulatory, funding and curriculum framework needs to occur in a responsible manner, bearing in mind the limited institutional and systemic capacities and resource constraints that characterise the present state of development. Accordingly, the Ministry will show flexibility in the way in which it introduces a co-ordinated national system. The Ministry envisages that the full introduction of the new system will take place over a five- to ten-year period (DoE, 1998a:93).

Endnote

1 See *SAQA Bulletin* 1(1) May/June 1997 for further information.

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Chapter 4

SOCIO-ECONOMIC AND EDUCATIONAL PROFILE OF KWAZULU-NATAL

Nisaar Mahomed

4.1 INTRODUCTION

KwaZulu-Natal as a region faces some of the most acute social problems afflicting South Africa. Table 4.1 below provides a snapshot view of some of the abject social conditions prevailing in the province as compared with South Africa as a whole.

Although KwaZulu-Natal accommodates 26% of South Africa's population, it provides only 15% of the country's economic output (GDP). The informal sector employs roughly a third of the economically active population and unemployment is among the highest in the country (Zuma, 1994:1). The province has a highly skewed spatial distribution of economic activity and enormously high social inequalities. Approximately 50% of its population live in poverty where the households earn less than R840 a month (*New Vision*, 1997:3-19).

Table 4.1: Demographic indicator statistics

	KwaZulu-Natal	South Africa
Population density, 1995 (persons per km)	94,5	33,3
Functional urbanisation, 1991 (%)	77,9	65,6
Literacy rate, 1994 (%)	46,6	47,5
Adult literacy rate, 1991 (%)	84,3	82,2
Life expectancy, 1991 (age)	61,6	62,8
Human development index, 1995	0,602	0,677
Disposable income per capita, 1995 (R)	5 865,0	8 056,0

Source: KZN Marketing Initiative, 1997:8

Although KwaZulu-Natal accommodates 26% of South Africa's population, it provides only 15% of the country's economic output (GDP). The informal sector employs roughly a third of the economically active population and unemployment is among the highest in the country (Zuma, 1994:1). The province has a highly skewed spatial distribution of economic activity and enormously high social inequalities. Approximately 50% of its population live in poverty where the households earn less than R840 a month (*New Vision*, 1997:3-19).

It is against this backdrop that future economic, social and human resource development policies will have to be devised for the province. The technical colleges of the future must play a key role in this social reconstruction.

The reconfiguring of the role of technical colleges to align with these new economic and social imperatives should be premised on a sound information base. This chapter aims to provide precisely such information by looking at three critical domains: economic

indicators, employment and labour market conditions, and education and training levels in the province.

4.2 ECONOMIC INDICATORS

4.2.1 Distribution of GGP by province

Gross geographic product (GGP) is a measure of a region's contribution to (percentage share of) gross national product (GNP). As the table below shows, KwaZulu-Natal is second in 1996 in this regard, although it lags by a massive 50% behind Gauteng (14,6% GGP as compared with Gauteng's 37%).

Table 4.2.1.1 Distribution of GGP by province

Gauteng	N Cape	E Cape	Mpuma-langa	Free State	W Cape	North West	KZN	N Prov
37%	2,3%	7,7%	8,1%	7,1%	13,1%	7,0%	14,6%	3,2%

Source: HSRC, 1996:124

Economic growth was uneven among the provinces in the 1980s. Some areas enjoyed growth rates in excess of 10% per annum while others had negative growth as shown in Table 4.2.1.2 below.

Table 4.2.1.2: Real annual growth in gross geographic product (GGP) by province, 1980-1988

Gauteng	N Cape	E Cape	M'langa	Free State	W Cape	N West	KZN	N Prov
1,0%	-0,3%	2,7%	4,5%	-0,2%	2,7%	3,2%	2,7%	6%

Source: HRSC, 1996:115

4.2.2 Inequality and HRD

South Africa's inequality is characterised by among other things an unequal distribution between rich and poor and also between geographical regions as Table 4.2.2.1 below shows. The mean

annual household income in Gauteng is for example double that of KwaZulu-Natal.

Table 4.2.2.1: Socio-economic indicators of provincial well-being

	Mean annual household income (R) 1993	Poverty head count (%) 1993	Literacy rate (%) 1991
W Cape	52 564	20,4	71,9
E Cape	15 451	59,1	59,0
N Cape	31 982	32,5	67,6
KZN	31 047	39,6	58,7
Free State	28 350	45,3	60,0
North West	20 483	47,8	55,8
N Province	13 587	63,5	52,7
Mpumalanga	30 281	42,8	54,6
Gauteng	58 051	25,9	69,0
TOTAL	33 753	41,1	61,4

Source: HSRC, 1996:121

Related to the uneven geographical distribution of income is the leakage of income generated in one region to another. Table 4.2.2.2 below shows the ratio of personal income to GGP, which essentially is a measure of the inhabitant's share in the production of the province. From the table below one can see that Mpumalanga is the biggest loser, keeping less than 60% of income generated in the province. This loss is due to the repatriation of profits by large mining houses to their head offices in major centres. In this regard KwaZulu-Natal is able to retain the third largest amount (82,3%) of income generated in the province.

TABLE 4.2.2.2: Provinces: personal income as proportion of GGP, 1991

Gauteng	N Cape	E Cape	M'langa	Free State	W Cape	N West	KZN	N prov
77,6%	73,4%	64,7%	58,9%	79,9%	87,2%	78,4%	82,3%	90,5%

Source: HSRC, 1996:122

KwaZulu-Natal is second only to Gauteng in terms of percentage contribution to South Africa's GDP as indicated in Table 4.2.2.3 below:

Table 4.2.2.3: Provincial distribution of GDP, 1995

Gauteng	N Cape	E Cape	M'langa	Free State	W Cape	N West	KZN	N prov
38%	2%	8%	8%	6%	14%	5%	15%	4%

Source: KZNMI, 1997:9

Table 4.2.2.4 shows the contribution of each of the sectors to KwaZulu-Natal's economy in 1995. Manufacturing far outstrips the other sectors and makes the largest contribution. This is despite brief periods in the 1980s when employment in the manufacturing sector began to decline (Crankshaw, 1997:29).

Table 4.2.2.4: Sectoral breakdown of the KZN economy, 1995

Manufact.	Construct.	Commerce	Transport	Electricity	Mining	Finance	Agriculture
36%	4%	20%	13%	2%	2%	18%	5%

Source: KZNMI, 1997:12

4.2.3 Economy and urbanisation in the 1990s

The 1990s in KwaZulu-Natal witnessed a process of rapid urbanisation under conditions of material, social and infrastructural deprivation. Moreover, the shift towards metropolitan areas already depleted by a devastated economy and a lack of infrastructural

investment, has coincided with a period when the economic surplus available to redirect resources into such areas has been the most restricted in decades. Urbanisation has proceeded more rapidly in this region than in any other. Between 1970 and 1980, Durban's population grew by 100%. The city consequently became an experimental laboratory for urbanisation schemes during the 1980s (Seneque *et al.*, 1993:1).

4.3 EMPLOYMENT AND LABOUR MARKET CONDITIONS

4.3.1 Employment

Successive manpower surveys have shown that there is a demand for skilled labour in non-manual occupations such as professional, managerial and supervisory work. At the same time the demand for less-skilled manual jobs such as artisan, semi-skilled and menial service jobs has decreased (Crankshaw, 1997:29). A case in point is KwaZulu-Natal where the finance sector, which requires that 24% of its workforce have tertiary education qualifications (high-level skills), has experienced an overall growth rate of just below 5%. In contrast, construction and manufacturing, which require much smaller percentages of high-level skilled workers (roughly 10%), have been able to show a growth rate of only 1% (*New Vision*, 1997:3-13).

South Africa has a dual logic economy. Formal business competes on the domestic and on the international front, while simultaneously the country's large informal sector continues to grow. Such an economy perpetuates a system where jobs are created in the high value-added, high-skill economic sectors, but are shed in the labour intensive industries. One conservative estimate puts the job loss over a ten-year period in South Africa between 1985 and 1995 at

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119 000 in the labour intensive economic sector (*New Vision*, 1997:2-1). In 1996 the total economically active population was estimated at 14,5 million, roughly 36% of the population. Total unemployment stood at 32% (*New Vision*, 1997:3-11).

KwaZulu-Natal has 20% of South Africa's labour force but produces only 15% of the GDP. In 1991 the economically active population (EAP) amounted to 2,4 million and those in formal employment totalled 1,35 million. This represented 56% of the EAP of the province (*New Vision*, 1977:4-1). More than 80% of those formally employed are concentrated in just five sectors: manufacturing, trade, catering, agriculture and government. A similar concentration is found in the geographic spread of the employment market. Almost 54% of those formally employed work in Durban and its surrounding areas, which also have the highest employment growth (*New Vision*, 1997:2-1). The manufacturing sector and the government represent the major employers in the region's economy. These two sectors accommodate almost 55% of the employees in the province (*New Vision*, 1997:3-23).

4.3.2 Informal sector

Present estimates place the informal sector nationally at 20% of employment. In KwaZulu-Natal this sector grew exponentially (because of the low absorption rate in the formal economy) at an estimated 10% per annum in the past decade. This is especially impressive considering that the KZN population grew at 2,5% per annum during this period (*New Vision*, 1997:2-1). Durban has 52% of the informal sector in the province, a figure that is growing at 12,5% per annum (*New Vision*, 1997:2-1)

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4.3.3 Unemployment

South Africa has numerous magisterial districts with unemployment rates of 80% and higher. The highest concentration of these districts are found in KwaZulu-Natal. With South Africa's labour force increasing by roughly 2,6% per annum, the country needs a 'growth rate of approximately 5,2% to absorb all new entrants onto the labour market, without making inroads into the existing unemployment problem' (HSRC, 1996:69). Indications, however, are that the best that can be hoped for is a growth rate of between 2,5 and 5%. This implies an inevitable increase in formal sector unemployment (HSRC, 1996:69).

The supply of jobs cannot keep pace with the growing demand for employment. The proportion of the extended labour force finding formal sector employment decreased from 56,2% in 1980 to 44,8% in 1991. According to 1995 estimates, the country's population numbered more than 41 million people of whom 33% were economically active (KZN Marketing Initiative, 1997). Furthermore, only 58% of those economically active participated in the formal economy (*New Vision*, 1997:3-6). In KwaZulu-Natal approximately 30% of a population of 8,7 million people are today economically active (KZN Marketing Initiative, 1997:59). If past labour trends continue, by the year 2000 there will probably be at least 1,9 million unemployed people in KwaZulu-Natal (*New Vision*, 1997:2-9).

4.3.4 Sectoral employment

The sectoral composition of employment in South Africa has changed substantially. This change is from a situation where the primary sector employment predominated to one where employment is mainly in the secondary and tertiary sectors. Over the past 45 years there has been marked growth in service sector jobs. Since

1980 such expansion has occurred primarily in government, finance, insurance, real estate and business services (Crankshaw, 1997:29).

The agricultural sector has suffered the worst haemorrhage, with the total number of people employed in this sector declining nationally by 15% between 1950 and 1993. Presently, this sector constitutes just 11% of the total workforce (HSRC, 1996:70). Nevertheless the agricultural sector is still the largest employer in most magisterial districts (HSRC, 1996:70).

The mining sector in South Africa has also experienced a dramatic drop in employment. Its share of total employment declined from 13% to just over 8% between 1950 and 1993. Between 1990 and 1993 there was a particularly sharp decline of 18% (HSRC, 1996:71). The clothing industry has also experienced a slump recently, especially in KwaZulu-Natal. In 1994 the clothing industry in the Greater Durban area employed almost 50 000 people – one year later this figure had dropped to about 35 000. With increased foreign competition, many firms, in an effort to benefit from lower wages, relocated to outlying areas such as Isithebe and Lesotho. Despite its recent poor performance, the clothing industry continues to play an important role in the region's economy (Netshitomboni, 1995:22).

Tourism's contribution to KwaZulu-Natal's gross geographic product (GGP) is estimated at between 9,3% and 11,7%. Its monetary contribution is between R7,4 billion and R9 billion, and the number of direct and indirect jobs created by the industry in the province is between 196 000 and 247 000. Tourism has tremendous growth potential and under more favourable conditions could see its contribution to GGP increase to 13% (*New Vision*, 1997:7-4).

The manufacturing sector has shown positive employment growth except in the recessionary period towards the end of the1980s. It is

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presently the largest employer of labour in KwaZulu-Natal, Gauteng and the Western Cape. The state has been able to reduce its reliance on the primary sector (agriculture and mining), which since 1975 has gradually declined. The secondary sector (manufacturing, trade, electricity and construction) experienced significant growth up to 1980 when the sector as a whole declined due in part to the poor growth in manufacturing. This does not bode well for South Africa as the fast-growing economies of East and South East Asia have been based on a strong manufacturing sector (HSRC, 1996:119).

Although manufacturing dominates KwaZulu-Natal's formal economy, contributing about 30% of the GGP, it accounts for only 14% of total employment (Zuma, 1994:2). This province in turn contributes about 20% of the total South African manufacturing output. The manufacturing sector experienced a marginal decrease in economic output from 1980 to 1991 (*New Vision*, 1997:3-23). The steady decline of this sector's importance has been blamed in part on low investment, skill shortages and highly capital-intensive structures (Zuma, 1994:3).

4.3.5 *Future of manufacturing in KwaZulu-Natal*

Computer-integrated manufacturing (CIM) is at the cutting edge of technological development in manufacturing globally. However, it in used to a limited extent in South African manufacturing. Although its use in aerospace and electronics is mandatory, these industries are poorly developed in KwaZulu-Natal. Equally poorly developed in this region is the complex infrastructure (especially human resources) required to support CIM technologies. As a possible engine for economic growth, CIM is pertinent to industrial

restructuring in a capital-constrained, labour rich area such as KwaZulu-Natal.

According to Porter (quoted in Seneque *et al.*, 1993:9) a region's (or even country's) competitive advantage is determined to a large extent by its access to technology and efficient use of skills rather than by previous advantages of low local wage rates. An economy dependent on such rates is regarded as having a poor foundation for sustained productivity growth and offers barely negligible hope for the improved quality of life for its people. The emergence of industrial districts (as has been mooted for northern KwaZulu-Natal and the eastern seaboard area that includes Richards Bay) is dependent on state investment in technical institutions (such as technical colleges) and infrastructure, and on inter-firm co-operation and access to global markets.

The fundamental shift in global economic competition has necessitated the adoption of flexible technologies and changes to the organisation of production. A labour rich area such as KwaZulu-Natal can benefit greatly from such changes provided it adapts to the changed circumstances and accepts that innovation and knowledge are key factors in global competition (Seneque *et al.*, 1993:18).

Table 4.3.5: Provincial distribution of employment opportunities in manufacturing, 1995

Gauteng	N Cape	E Cape	M'langa	Free State	Cape	N West	KZN	N Prov
35%	2%	9%	5%	3%	17%	4%	24%	2%

Source: KZNMI, 1997:11

As can be seen from the Table 4.3.5 above, KwaZulu-Natal has the second highest level of employment in the manufacturing sector. If it wishes to continue to grow its manufacturing base, the province

will have to develop the knowledge, skill and infrastructure needed for it to participate competitively in the high-tech, high-skill global manufacturing economy.

4.4 EDUCATION AND TRAINING LEVELS

A critical factor in economic development is the distribution of skills within the labour force. It is estimated that KwaZulu-Natal has 250 000 people in the labour force with high-level skills, 1,7 million with mid-level skills and 1,4 million with low-level skills (*New Vision*, 1997:4-5).

4.4.1 Human development

The level of human development in a country is measured by the freedom of its citizens to choose. In order to make informed choices, citizens need basic human capacities and a reasonable range of opportunities. The Human Development Index (HDI) is a figure that expresses the development level of a community. It combines assessments of the health (measured by life expectancy), knowledge (measured by literacy and years of schooling) and standard of living (measured by per capita income) of society's members and thus indirectly on all the factors which have an influence on these elements (HSRC, 1996:140).

Although the province's HDI increased in 1980, its population suffers from low levels of human development and in 1994, KwaZulu-Natal registered the third lowest HDI in South Africa (DBSA 1994:63 and DBSA 1995:8). With 1 representing the maximum, this means that the higher the value, the more developed the area is. Currently KwaZulu-Natal has an HDI measure of 0,58.

Table 4.4.1: Human development index by province

Gauteng	N Cape	E Cape	M'langa	Free State	W Cape	N West	KZN	N prov
0,71	0,73	0,48	0,61	0,66	0,76	0,57	0,58	0,40

Source: DBSA, 1994:63; HSRC, 1996:140

To complicate matters, the province is characterised by stark contrasts. On the one hand it is well endowed with natural resources and a good infrastructure. Its diversified formal economy is relatively less vulnerable to cyclical downturns. On the other hand the vulnerable rural economy 'has resulted in striking levels of inequality, markedly uneven spatial development, poorly developed human resources, high levels of violence and political dissonance, endemic political intransigence and increasing impoverishment of the poor' (DBSA, 1994:63).

4.4.2 Adult literacy

Most of KwaZulu-Natal's districts are populated by functionally illiterate adults with a Std 5 level of education. Only 42% of African adults have a Std 6 or higher level of education and only 9% have matriculated (Krige and Badcock-Walters, 1995:3). These figures represent an enormous disadvantage in terms of an individual's quality of life and also in terms of the 'levels of productivity that can realistically be expected in the economy' (Krige and Badcock-Walters, 1995:3).

4.4.3 Loss of civil service skills

Since 1995 at least 50% of senior officials, at director level and above, from the former apartheid education departments, have opted for retirement. This represents the highest loss in terms of experience and knowledge of any province thus far. This skills

haemorrhage implies that in the short to medium term KwaZulu-Natal will experience a significant vacuum in management and direction.

4.4.4 Education budget

The education budget for 1995/1996 as the first tangible sign of a priority shift from the advantaged to the disadvantaged provinces. KwaZulu-Natal and the Eastern Cape were given increases commensurate with their educational backlogs. The following year the budget reflected a similar shift in funding patterns to disadvantaged provinces (Jita 1998:1). Notwithstanding this, the national Department of Education has little (if any) control over the size of provincial education budgets. This budget is determined by the provincial legislature on the basis of block grants from national government and does not necessarily correspond with the obligations of the particular provincial education department. The Department of Finance, on the basis of the indicative budgets of line departments such as education, calculates the size of the provincial budgets. However the provincial governments determine the actual amount made available to their education departments. Both national and provincial departments are currently examining this patently unsatisfactory situation.

Education expenditure for South Africa as a whole was R35,2 billion in 1996/1997. From 1990/1991 to 1996/1997 the actual amount of money allocated to education doubled from R17,4 billion to R35,2 billion. However the education budget as a proportion of the national budget actually decreased from 21% to 20% over the same period (Shindler, 1997:5).

In the 1997/1998 national budget, R36,5 billion was allocated to education. Of this amount, R6,1 billion was allocated to the KwaZulu-Natal Department of Education and Culture, which

nevertheless managed to overspend by R800 million (Zafar, 1998:3). Table 4.4.4.1 below shows the spending on education by provinces in terms of key cost items:

Table 4.4.4.1: Provincial education spending in terms of key cost items, 1995/1996 (as percentage)

	EC	NC	WC	FS	KZN	GAU	MP	NP	NW
Administration	1,6	6,3	2,8	9,4	4,1	1,4	10,5	18,4	9,7
Auxiliary services	1,2	0,3	1,3	2,3	2,0	1,6	2,2	–	2,3
Public schools	92,4	83,6	81,9	85,6	85,4	81,6	80,0	74,0	81,7
Private schools	0,5	0,5	1,0	0,6	0,8	4,0	0,3	–	0,4
Special schools	0,8	3,1	7,0	1,6	1,8	4,0	1,4	0,9	2,3
Teacher training	2,3	2,3	3,2	2,2	3,5	3,2	2,0	5,1	2,6
Technical colleges	0,4	1,8	2,2	1,5	1,8	3,0	1,8	0,9	0,5
Adult education	0,9	0,4	0,8	0,7	0,3	1,1	1,9	-	0,5

Source: Bot,1996:6

4.4.5. Senior Certificate

The 1996 Std 10 examinations were the first racially integrated examinations ever held. KwaZulu-Natal had the second largest number of candidates (17% of the total) and the largest number of passes. The Western Cape recorded the highest pass rate (Shindler 1997:7). Since 1994 KwaZulu-Natal has experienced a decline in the number of passes and in exemptions.

In 1997 the Western Cape again recorded the highest matric pass rate. It also had the highest proportion of candidates who obtained

university exemptions. This represented a decrease of 11% from 1996. KwaZulu-Natal was second with 18%, a decrease of 5% from the previous year (Shindler, 1998:3).

Table 4.4.5: Standard 10 examination results, 1997

	Candidates	Passes	Exemptions
E Cape	76 700	45%	9%
Free State	40 027	42%	11%
Gauteng	75 700	52%	17%
KwaZulu-Natal	104 434	53%	18%
Mpumalanga	37 734	46%	9%
N Cape	7 604	64%	15%
N Province	127 337	32%	6%
North West	48 534	50%	11%
W Cape	37 197	76%	24%
NATIONAL	555 267	47%	12%

Source: Edusource (March 1998:2)

4.4.6 Apprenticeships

Tables 4.4.6.1 and 4.4.6.2 show that there was a steady increase in student enrolment at technical colleges between 1987 and 1995 from 54 000 to 154 688. At the same time, however, there was a decline in the number of those who completed apprenticeship contracts (SAIRR, 1997:202). This figure decreased by 25% from 1991 to 1995 and the number of people who registered for apprenticeship contracts dropped by 48% in the same period (SAIRR, 1997:205/6).

Table 4.4.6.1: Technical college enrolment by province, 1995

(Figures are for actual enrolment not for full-time equivalents.)

	Colleges	Males	Females	Matric	M+3/and above
Eastern Cape	25	15 000	30 000	25 000	20 000
Free State	10	5 200	8 000	7 000	7 100
Gauteng	33	15 000	24 000	16 000	22 100
KwaZulu-Natal	23	3 733	2 572	–	–
Mpumalanga	9	8 698	4 819	8 314	8 314
North West	6	4 587	2 559	2 867	1 405
N Cape	6	872	1 271	1 155	987
N Province	14	6 940	2 334	–	–
W Cape	18	11 774	7329	9 076	10 027
TOTAL	144	71 804	82 884	154 688	

Source: SAIRR (1997:201); EduSource (Dec. 1996:11)

Table 4.4.6.2: Technical college enrolment, 1987-1995

(Figures exclude former independent homelands.)

	Number enrolled	Increase/(Decrease)
1987	54 078	N/A
1988	58 795	8,7%
1989	65 374	11,2%
1990	72 174	10,4%
1991	76 435	5,9%
1992	89 933	17,7%
1993	93 044	3,5%
1994	91 974	(1,1%)
1995	154 688	–

Source: SAIRR (1997:202)

As is evident from the tables above, growth in the technical college sector has been phenomenal since 1990, literally doubling in five years by 1995. KwaZulu-Natal enrolls approximately a third of all technical college students with only 16% of the campus infrastructure. This increasing enrolment to train at the intermediate to high-skill levels bodes well for the future when the technical colleges will be expected to play a major role in overcoming the acute labour market, employment and economic growth problems of the country.

Chapter 5

QUANTITATIVE OVERVIEW OF THE TECHNICAL COLLEGES OF KWAZULU-NATAL

Graham Hall

5.1 INTRODUCTION

This chapter reports on the quantitative findings of the HSRC questionnaire that was distributed to all technical colleges in KwaZulu-Natal. The findings are grouped as follows:

- information on the number of colleges and their location
- the range of programmes and offerings presented
- the teaching and administrative staff
- the students
- the success of the students
- the governance of the colleges
- the financing of colleges
- the facilities.

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There is always a danger that in the process of aggregating information the essential differences between the colleges will be lost. The colleges in KwaZulu-Natal are not homogeneous and consequently there will be exceptions to almost every generalisation made. However, it is important to locate the strengths and the weaknesses of each college against the "norm" generated by the sector. If appropriate, comparisons will be made with national or other provincial norms.

5.2 THE NUMBER AND LOCATION OF COLLEGES

There are 26 technical colleges serving the needs of KwaZulu-Natal. TECHNISA, which is a national distance education college, provides distance education to students in KwaZulu-Natal but was not included in the study. This is partly because its delivery mode is fundamentally different from that of all other technical colleges, and partly because it is located in Gauteng and as such does not fall under the KwaZulu-Natal. One private technical college, First Choice Varsity College, was included in the study.

The 25 colleges are distributed throughout the province. The geographic location extends along the coast from Port Shepstone to Richards Bay and from the coast at Durban along the highway to Newcastle. As could be expected, the main concentration of technical colleges is along the Durban-Pietermaritzburg axis. Map 1 gives the location of the colleges. The favourable distribution of the colleges, close to the major industrial areas, is a strength and if there is to be expansion of the sector, the location of any new college should take the present distribution of colleges into account.

Table 5.2.1: Location, size and type of KZN technical colleges

College	Magisterial district	FTEs*	Classification
Durban Technical College	Durban	1 177	State-aided
Durban Central Technical College	Durban	691	State-aided
Richtek College of Vocational Education	Empangeni	848	State-aided
Ladysmith Technical College	Klipriver	315	State-aided
Newcastle Technical College	Newcastle	728	State-aided
Msunduzi Technical College	Pietermaritzburg	540	State-aided
Pinetown Technical College	Pinetown	467	State-aided
Port Shepstone College	Port Shepstone	448	State-aided
Vryheid Technical College	Vryheid	261	State-aided
Swinton Road Technical College	Durban	1 255	State
Cato Manor Technical College	Durban	1 535	State
L C Johnson College	Durban	663	State
Edendale Technical College	Edendale	280	State
Ntuzuma Technical College	Kwamashu	310	State
Madadeni Technical College	Madadeni	1 007	State
Ezakheni Technical College	Mnambithi	110	State
St Oswalds Technical College	Newcastle	638	State
Nongoma Technical College	Nongoma	381	State
Sivananda Technical College	Ntuzuma	98	State
KZN Midlands Technical College	Pietermaritzburg	468	State
Northdale Technical College	Pietermaritzburg	870	State
Plessislaer Technical College	Pietermaritzburg	603	State
Enyenyesi Technical College	Port Shepstone	379	State
Umlazi Technical College	Durban	1 018	State
First Choice Varsity College	Durban	92	Private

* Based on KZN Department of Education data

Fifteen of the technical colleges (i.e. 60%) are state colleges, nine are state-aided colleges and one is a private college. The divide between state and state-aided colleges reflects the differences between the former Natal Education Department colleges (white) and those

colleges that fell under the Department of Education and Training (black), the former KwaZulu Education Department (black), the House of Representatives (coloured) and the House of Delegates (Indian). Major differences, in terms of governance and financing, existed between state and state-aided colleges. This divide, which still exists, cannot be justified and the implementation of the new FET legislation must be used to remove inequalities that have been allowed to continue for far too long.

5.3 RANGE OF COURSES AND PROGRAMMES

Courses in five vocational fields are currently offered at colleges in KwaZulu-Natal:

- *Engineering*: Civil, Mechanical, Electrotechnical, Industrial, Motor
- *Business:* Secretarial, Business, Accounting, Public Administration
- *Utility industries:* Clothing and Textiles, Food, Hairdressing, Tourism
- *Social services:* Educare, Child Care, Performing Arts, Visual Arts
- *General education:* National Senior Certificate courses

Table 5.3.1 provides details of the courses on offer in the 25 technical colleges in KwaZulu-Natal. As can be seen, national programmes in Business and Social Services are more homogeneous than Engineering programmes. Without exception, colleges presenting programmes in Business Studies include instructional offerings in Secretarial, Business Studies and Accounting subfields. However, instructional offerings in the subfield of Public Administration are offered by only 25% of those colleges that present programmes in Business Studies. It is difficult to understand the reluctance on the part of colleges to present programmes in Public Administration given the urgent need to develop the capacity of the Public Service

Map 1: Location of technical colleges in KwaZulu-Natal

No. on map	Name of college
1	Durban Technical College
2	Durban Central Technical College
3	Richtek College of Vocational Education
4	Ladysmith Technical College
5	Newcastle Technical College
6	Msunduzi Technical College
7	Pinetown Technical College
8	Port Shepstone College
9	Vryheid Technical College
10	Swinton Road Technical College
11	Cato Manor Technical College
12	L C Johnson Technical College
13	Edendale Technical College

No. on map	Name of college
14	Ntuzuma Technical College
15	Madadeni Technical College
16	Ezakheni Technical College
17	St Oswalds Technical College
18	Nongoma Technical College
19	Sivananda Technical College
20	KZN Midlands Technical College
21	Northdale Technical College
22	Plessislaer Technical College
23	Enyenyesi Technical College
24	Umlazi Technical College
25	First Choice Varsity College

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Table 5.3.1: Details of programmes offered in the five vocational fields

Vocational field	Subfield	The % of colleges offering programmes in the subfield
Engineering	Civil	57%
	Mechanical	78%
	Electrotechnical	96%
	Industrial	39%
	Motor	74%
Business	Secretarial	100%
	Business Studies	100%
	Accounting	100%
	Public Administration	25%
Social Services	Educare	100%
	Care of Children	17%
	Visual Arts	50%
	Performing Arts	33%
Utility Industries	Food	40%
	Hairdressing	60%
	Tourism	40%
General Education	NSC courses	100%

The technical college sector in KwaZulu-Natal presents 387 different instructional offerings in the five vocational fields (refer to Table A.5.3.1 in the appendix for a full list). Ninety-three percent of these instructional programmes are "national" offerings that are examined nationally and are governed by strict rules of combination. There is considerable duplication between colleges situated close to one another. This duplication, with the associated cost implications, is a reflection of the fragmentation of the apartheid education system.

There is evidence that innovative course development is taking place in a few colleges. However, the total number of "non-national" offerings is only 7% of the total number of instructional offerings presented and there appears to be little that can encourage colleges to move in the direction of presenting a variety of courses that could attract students to "non-formal" courses.

Table 5.3.2: Instructional offerings by vocational field, subfield and certificate level

FE/HE split	Subfield	Level	Total number of instruction-al offerings in all colleges	Percentage of the total number of instructional offerings
Further Education	Business Studies	N1	55	0,9%
Further Education	Business Studies	N2	90	1,5%
Further Education	Business Studies	N3	162	2,7%
Further Education	Social Services	N2	4	0,0%
Further Education	Social Services	N3	18	0,2%
Further Education	Engineering & Science	N1	876	14,6%
Further Education	Engineering & Science	N2	963	16,0%
Further Education	Engineering & Science	N3	881	14,6%
Further Education	Utility Industries	N2	4	0,0%
Further Education	Utility Industries	N3	22	0,3%
Higher Education	Business Studies	N4	484	8,1%
Higher Education	Business Studies	N5	299	5,0%
Higher Education	Business Studies	N6	262	4,4%
Higher Education	Social Services	N4	33	0,5%
Higher Education	Social Services	N5	11	0,2%
Higher Education	Social Services	N6	16	0,2%
Higher Education	Engineering & Science	N4	713	11,9%
Higher Education	Engineering & Science	N5	552	9,2%
Higher Education	Engineering & Science	N6	507	8,4%
Higher Education	Utility Industries	N4	22	0,4%
Higher Education	Utility Industries	N5	19	0,3%
Higher Education	Utility Industries	N6	14	0,2%s
	TOTALS		6 007	100%

Table 5.3.2 groups the instructional offerings by subfield and N-level. Over 70% of all instructional offerings are presented in Engineering. Utility Industries hardly feature at all with little more than 1% of the instructional offerings. Details of the range of instructional programmes presented in the 25 KZN technical colleges, together with information on the number of times each offering is presented, can be found in Table A.5.3.2 in the appendix.

Tourism and catering are major industries in KwaZulu-Natal but courses in these two important subfields do not appear to attract students. Very few colleges present programmes in these subfields and it would appear that these two areas are largely neglected. It may be that the colleges do not present these programmes because the students show no interest, or it may be that the students do not take these courses because the courses are not widely available. It may also be that the tourism and catering industries do not encourage their employees to attend the courses because the courses do not meet their requirements. If the latter is the case, steps should be taken to revise the curriculum.

The visual and performing arts are largely ignored by the technical college sector, with only three colleges and six lecturers presenting programmes in the field.

Table 5.3.3 gives the number of instructional offerings presented to classes of various sizes. It should be noted that the table reflects the annual student enrolment for each instructional offering. If an instructional offering is repeated in each semester or trimester, the enrolment figure used in this analysis is the summation of these semester or trimester enrolments. The effect is to inflate the class size in Table 5.3.3.

The problem of small class size is particularly acute in Engineering where students are encouraged to choose courses that are relevant

to their employment. The presentation of programmes in Engineering on a trimester and in Business Studies on a semester basis aggravates the situation.

Table 5.3.3: Class size (analysis based on headcount by FET/HET band)

Class	FET band		HET band	
	Number of instructional offerings	% of the FET band	Number of instructional offerings	% of the FET band
Less than 10	78	10,4%	86	12,2%
Less than 15	140	18,7%	160	22,8%
Less than 20	176	23,5%	243	34,6%
Less than 25	229	30,5%	318	45,2%
Less than 30	285	38,0%	354	50,4%
Less than 40	341	45,5%	431	61,3%
Less than 50	404	53,9%	486	69,1%
50 or more	346	46,1%	217	30,9%
Total	750	100,0%	703	100,0%

* Based on an analysis of the enrolments for 1 453 instructional offerings in 25 colleges.

In the FET band nearly 40% of all instructional offerings are presented where the total student enrolment for an academic year is 30 or fewer. In the HET band, 50% of all instructional offerings also have a total enrolment for the year of 30 or fewer. In the FET and the HET bands approximately 10% of all instructional programmes have a yearly enrolment of fewer than ten students. Currently, the only way colleges can offer many of these instructional offerings is by combining, into a single class, various instructional offerings. This is not a desirable state of affairs and colleges should look critically at the number of offerings available.

Chapter Six argues that the current trimester basis on which Engineering courses are presented is highly problematic. The time available, 13 weeks, is too short for a sustained learning experience,

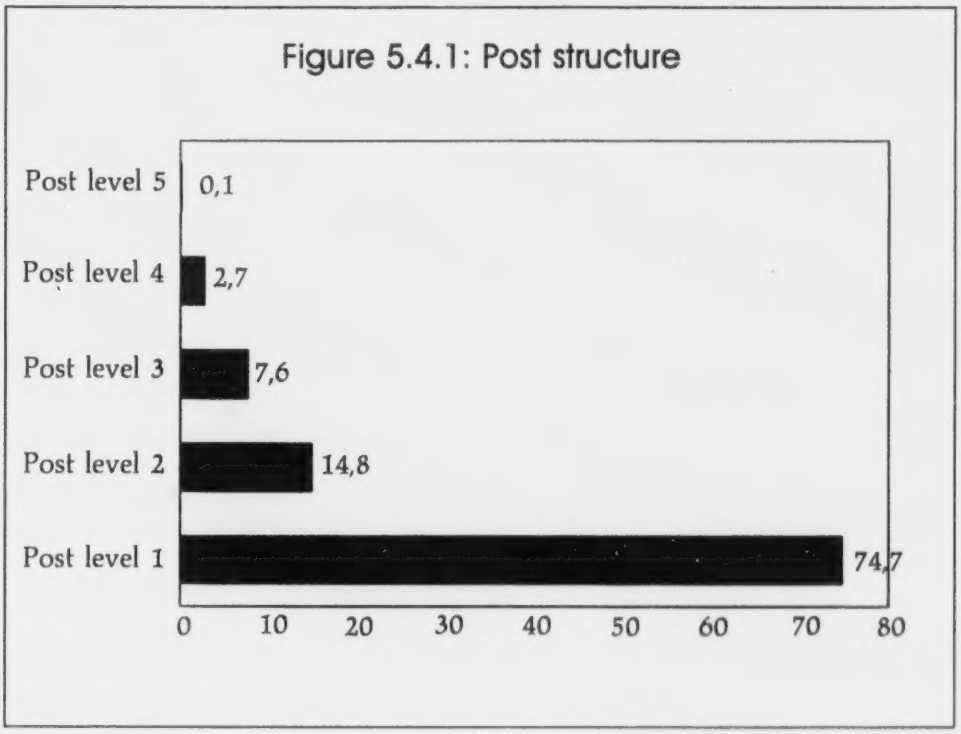
many of the syllabuses are out of date, and there is an artificial divide between theory and practice.

5.4 TEACHING STAFF

5.4.1 Staff establishment

The information on the staff establishment obtained from colleges and the information obtained from the KZN Department of Education correspond closely. At the end of March 1998 the colleges indicated that there were 837 posts on their establishment. (KZN Department of Education gives the post establishment as 848.) Table A.5.4.1 in the appendix gives a breakdown of the teaching staff by postlevel for each college together with the official total number of teaching posts on the establishment.

Figure 5.4.1: Post structure



The flat base to the post structure is a disturbing feature of the post level allocation in technical colleges. Ninety percent of the posts at the colleges are either at Post level 1 or Post level 2. There are far too few senior posts at Post level 3, post level 4 and Post level 5 to provide the high-level management skills required to run technical colleges. A direct result of the limited number of senior posts is that the senior personnel of a college are too busy with administration and spend less and less time in the classroom teaching. (Section 5.4.4 contains details of the teaching staff workloads.)

5.4.2 Part-time vs full-time teaching staff

Colleges can divide full-time posts into a number of half- or quarter-time posts. This is necessary to provide the range of skills and knowledge required to adequately cover the large number of instructional offerings, particularly in Engineering. Forty-four full-time posts were used to create part-time jobs in this way.

Ninety-three percent of the teaching staff is employed on a full-time basis. Only one of the 44 posts converted to part-time positions is deployed at a state college. It is surprising that so few part-time staff are used by the technical colleges given the large number of instructional offerings. A possible explanation is the high cost of employing part-time staff. This could explain why state colleges make so little use of this option.

5.4.3 Staff:Student ratio

Based on the data of the KZN Department of Education, the average FTE:staff ratio is 17,9. (Table A.5.4.3 in the appendix gives this ratio for each college.) The FTE:staff ratios vary from 13,5:1 at Ntuzuma Technical College to 20,1:1 at L C Johnson Technical College. A number of colleges have enjoyed a generous allocation by the KZN Department of Education for FTEs based on

"workshops" and this probably explains why four colleges have an FTE:staff ratio of less than 15:1.

Currently, the pupil:teacher ratio applying in secondary schools is 35:1, in comparison with which the technical college sector is very generously staffed. However it is doubtful whether technical college sector ratios can be sustained.

5.4.4 Staff workload

The workload for a technical college lecturer consists of teaching, running practical workshops, lesson preparation, marking and general administrative duties. Table 5.4.4 shows the hours spent on each of the above. There is some doubt as to the validity of the data submitted by certain colleges as many of the lecturers entered workloads they believed were the required number of hours and not the actual hours they worked.

On average lecturers teach (theory and practical) 25 hours a week, senior lecturers 18,5 hours a week, heads of department (HoDs) 11 hours a week and vice-principals four hours a week. Principals and senior vice-principals do not teach at all. At some colleges the HoDs of large divisions and senior lecturers spend all their time on administrative duties. Clearly, it is undesirable when senior staff of technical colleges are effectively out of the classrooms.

Table 5.4.4: Analysis of time spent on teaching and other duties by post level

Average hours	Lecturer	Senior lecturer	HoD	Vice-principal	Senior vice-principal	Principal
Teaching theory	20,4	16,6	9,9	4,1	0,0	0,0
Practicals	4,8	1,9	1,2	0,0	0,0	0,0
Preparation	8,1	6,5	5,6	2,5	0,0	0,0
Admin duties	2,4	11,1	21,6	33,3	38,3	40,1
Total	35,7	36,1	38,3	39,9	38,3	40,1

5.4.5 Gender

Fifty-nine percent of the teaching staff is male. This slight gender imbalance should be interpreted with caution as it is due to the fact that departments in the Engineering subfield are staffed almost entirely by males (94% males) while the opposite is true in Business Studies (82% females), Utility Industries (77% females) and Social Services (87% females). The gender imbalance in these fields is more exaggerated.

Table 5.4.5.1: Gender analysis by vocational field

Vocation field	Females	Males	Total
Engineering	24	370	394
Business	233	52	285
Utility Industries	30	9	39
Social Services	13	2	15
Visual/Performing Arts	4	4	8
Other & General Education	11	20	31
Totals	315	457	772
	41%	59%	100%

Table 5.4.5.2 illustrates how the combination of vocational fields at a selected sample of colleges affects the ratio of males to females on the establishment.

Table 5.4.5.2: Gender imbalances at a selected sample of KZN technical colleges

College	% Males	% Females	Size and vocational field
Sivanda	100%	0%	Small; Engineering
Port Shepstone	50%	50%	Small; Engineering & Business
Msundusi	52%	48%	Medium; Engineering & Business
Vryheid	7%	93%	Small; Business
Pinetown	82%	18%	Medium; Business
Madadeni	55%	45%	Large; Engineering & Business

Gender inequalities exist at all levels of senior management in the technical college sector. Females fill 42% of all junior posts (lecturer and senior lecturer) while they fill only 28% of senior posts. Currently, only six females hold principal or vice-principal positions.

Table 5.4.5.3: Gender analysis by teaching post level

Gender	Lecturer	Senior lecturer	HoD	VP or senior VP	Principal or act. principal	Total
Males	343	59	30	9	24	465
Females	265	25	19	5	1	315
% Males	56%	70%	61%	64%	96%	59,6%
% Females	44%	30%	39%	36%	4%	40,3%
Total	608	84	49	14	25	780

5.4.6 *Racial composition of teaching staff*

Colleges supplied information on the racial classification of 772 lecturers. The racial composition of teachers in the technical college sector reflects the fragmented and segregated past when the teaching staff of colleges was drawn almost exclusively from one racial group which reflected the ethnic bias of the department under which the college fell. Table A.5.4.6.1 in the appendix indicates that little has changed: In a number of colleges that previously fell under the House of Assembly, the teaching staff has remained almost exclusively white. Colleges that formerly fell under the House of Representatives and the House of Delegates have failed to increase, in any significant way, the number of black teachers on the staff of these colleges. Table A.5.4.6.2 in the appendix analyses the number of posts held at the various post levels by race. A larger percentage of whites, coloureds and Indians hold promotion posts compared with the number of promotion posts held by blacks.

The situation is particularly acute when one considers the racial composition of the student body. Colleges could find themselves

under increasing pressure from a largely black student body. There is the possibility that staffing imbalances will become a major cause of campus tension in the future. Many technical colleges do not meet the requirements of the Employment Equity Act and the colleges will find themselves in conflict with the law unless steps are taken to address the issue.

Some colleges are making attempts to recruit and train black staff but in general colleges have failed to identify this as a priority and there are very few examples of affirmative action policies being put in place.

A staffing equity ratio may be defined as the percentage of teachers belonging to a particular racial group divided by the percentage of students coming from the same racial group. Table 5.4.6.1 uses this concept to illustrate the serious racial imbalances in the staff of technical colleges. If the racial composition of the teaching staff of the colleges in KwaZulu-Natal is to reflect the racial composition of the student body, then the ratio of teachers to students for each racial group should be 1. (For example, if 80% of the student body were black then a "staffing equity ratio" of 1 would mean that 80% of the teaching staff should be black.) As can be seen from Table 5.4.6.1 this is not the case and the serious imbalances, which the staffing equity ratio highlights, cannot be allowed to continue.

Table 5.4.6.1: Racial composition of teaching staff and students

	Black	Coloured	Indian	White
Teaching posts in all colleges	185	57	177	353
% of total	24%	7%	23%	46%
% of total student population	79,4%	1,6%	9,2%	9,8%
Equity ratio, i.e. % teachers / % students	0,3	4,3	2,5	4,7

State-aided colleges (i.e. colleges that formerly fell under the House of Assembly) are staffed essentially by whites (82%) with only 6% of the teaching posts filled by blacks. Full details of the percentage of students in each racial group by state, state-aided and private colleges can be found in Table 5.4.6.2. Four of these state-aided colleges (Ladysmith, Newcastle, Port Shepstone and Vryheid) reported that there were no blacks on the teaching staff. Critics of the pace of transformation of the technical college sector would cite these colleges as prime examples that transformation of the technical college sector is not taking place.

Table 5.4.6.2: Racial classification of teaching staff (analysis by state vs state-aided)

	Racial classification				
	Black	**Coloured**	**Indian**	**White**	**Total**
State	33%	10%	30%	28%	501
State-aided	6%	2%	10%	82%	262
Private	22%	0%	78%	0%	9
Totals %	24%	7%	23%	46%	100%
Totals	185	57	177	353	772

5.4.7 Home Language of teaching staff

Fifty-nine percent of the white teaching staff are English speaking and 40% are Afrikaans speaking. Black lecturers are almost all isiZulu speakers (96%) with isiXhosa and English making up the remainder. Indian and coloured teaching staff are essentially English speaking.

Table 5.4.7.1: Home language by racial classification of teaching staff

	Home language				
	IsiZulu	**Afrikaans**	**Other**	**IsiXhosa**	**English**
Black	177	2	1	2	3
Coloured	0	1	0	0	56
Indian	0	0	8	0	169
White	1	144	1	0	207
Totals	178	147	10	2	435

5.4.8 Age profiles

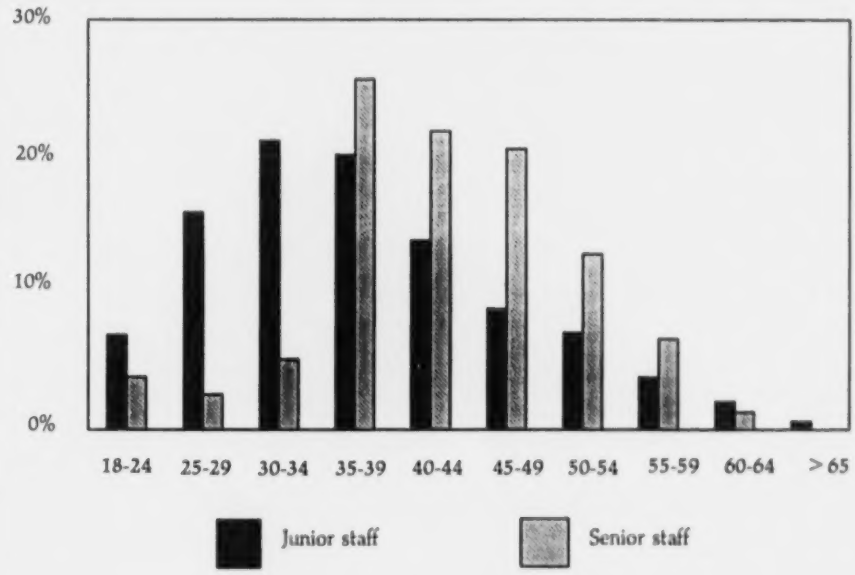
The average age of the female lecturers at 31 March 1998 was 36,1 years and that of the male lecturers was 39,4 years. Table 5.4.8.1 shows the average age of males and females in each of the post level categories. The female lecturers are younger in each post level classification.

Table 5.4.8.1: Average age of teaching staff by post level

Gender	Lecturer	Senior lecturer	HoD	VP & SVP	Principal
Female	35,5	39,0	39,7	41,0	N/A
Male	38,1	42,9	41,9	46,7	45,5

The age profile (Fig 5.4.8.1) illustrates the differences between junior staff and senior staff. As expected, senior staff are older but the distribution of both groups indicates that a significant number of the staff are under 40 years of age.

Figure 5.4.8.1: Age profile of teaching staff



5.4.9 Qualifications of teaching staff

Staffing a technical college with suitably qualified staff has always been difficult because a college lecturer is expected to have a teaching qualification as well as specialised subject knowledge and relevant business or industrial experience. In the technical college sector there is a greater range of qualifications than in any other sector in education and there has always been some debate regarding the definition of a "qualified technical college lecturer".

For the purpose of this study, a qualified lecturer is a person with a minimum of an M+3 diploma or certificate together with a teaching qualification. Applying this definition, a lecturer with a degree but not having a teaching qualification would be regarded as unqualified. The number of unqualified lecturers in the technical college sector is small at less than 7%. Underqualified lecturers are

usually in possession of an M + 1 or M + 2 certificate or diploma: this small group constitutes 6% of the total.

The teaching staff at technical colleges may conveniently be divided into "senior" and "junior" staff. Senior staff would include the principal, vice-principal and HoDs, while the junior staff would include lecturers and senior lecturers. Qualifications of the staff were analysed on the basis of the divide between senior and junior staff.

Table 5.4.9.1: Teaching staff qualifications

Qualification	% Junior staff	%Senior staff	All staff
National Certificate N1 or NTC 1	0,7%	0,0%	0,6%
National Certificate N2 or NTC2	0,7%	0,0%	0,6%
National Certificate N3 or NTC3	4,6%	0,0%	4,1%
National Certificate N4 or NTC4	4,9%	0,0%	4,4%
National Certificate N5 or NTC5	1,4%	1,3%	1,4%
National Certificate N6 or NTC6	3,8%	0,0%	3,4%
National Certificate Technikon M + 1	1,0%	0,0%	0,9%
National Certificate Technikon M + 2	2,0%	0,0%	1,8%
National Diploma	22,3%	15,0%	21,5%
National Higher Diploma	20,4%	27,5%	21,1%
Non-National Certificates or Diplomas	2,0%	3,8%	2,2%
B Degree without teaching diploma	4,8%	2,5%	4,5%
B Degree with teaching qualification	12,0%	10,0%	11,8%
Hons without a teaching qualification	1,6%	17,5%	3,2%
Hons with teaching qualification	3,5%	8,8%	4,0%
Master's Degree	1,4%	1,3%	1,4%
Qualification not provided	12,9%	12,5%	12,8%
Total	100,0%	100,0%	100,0%

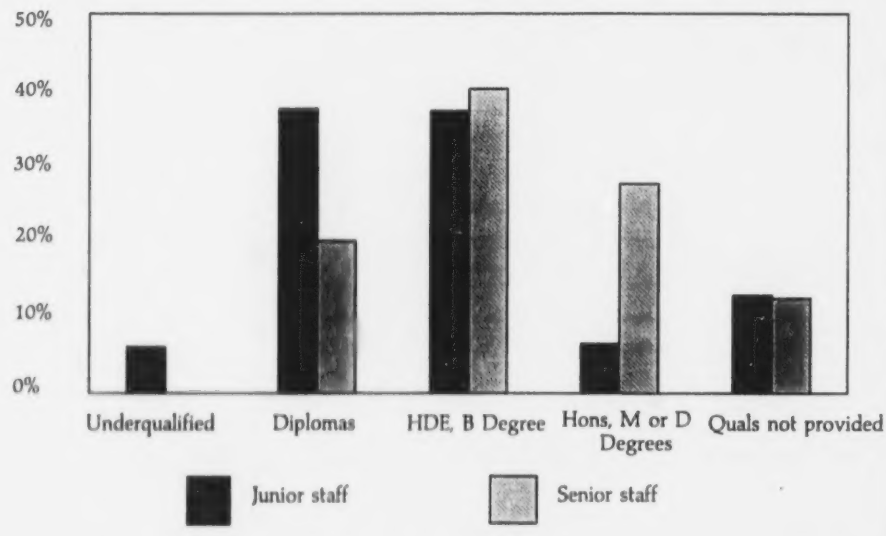
Senior staff in the college sector are academically better qualified than junior staff. Staff holding permanent senior positions all have diplomas, higher diplomas or degrees with 27% having Honours, Master's or doctoral qualifications. Table 5.4.9.2 gives details of the staff qualifications by the split between senior and junior staff.

Table 5.4.9.2: Qualifications of senior vs junior teaching staff

Qualification details	Junior staff lecturer and senior lecturer	Senior staff principal, vice-principal and HoDs
Underqualified	6,1%	0,0%
Diplomas (M + 3)	37,4%	20,0%
Higher diplomas, B Degrees	37,1%	40,0%
Hons, M and doctorates	6,5%	27,5%
Qualifications not provided	12,9%	12,5%

A significant number of the teaching staff (13%) did not provide their qualifications and nine principals did not furnish their personal details.

Figure 5.4.9.1: Qualifications of senior vs junior teaching staff



5.5 ADMINISTRATIVE STAFF

5.5.1 Provision

Technical colleges are complex institutions that serve the diverse needs of industry and the local community. The administrative demands made on technical colleges are considerable. Registration of students takes place three times a year and there are the considerable administrative demands made by a national examination. State-aided colleges have the additional requirement of managing the financial affairs of the college. Teaching facilities, particularly the technical workshops and practical rooms, require supervision and maintenance. These duties are the responsibility of the administrative staff who report to the principal and the college council.

The administrative staff establishment can be divided into four main categories: The first includes administration officers, administration clerks and typists; the second includes staff responsible for the provision of support services; the third group includes caretakers, ground staff and cleaners; the fourth group provides for security services.

Table A.5.5.1 in the appendix reflects details of the administrative and support staff grouped according to these categories. Also included is information on the number of administrative posts paid for by the college and the number of vacant posts.

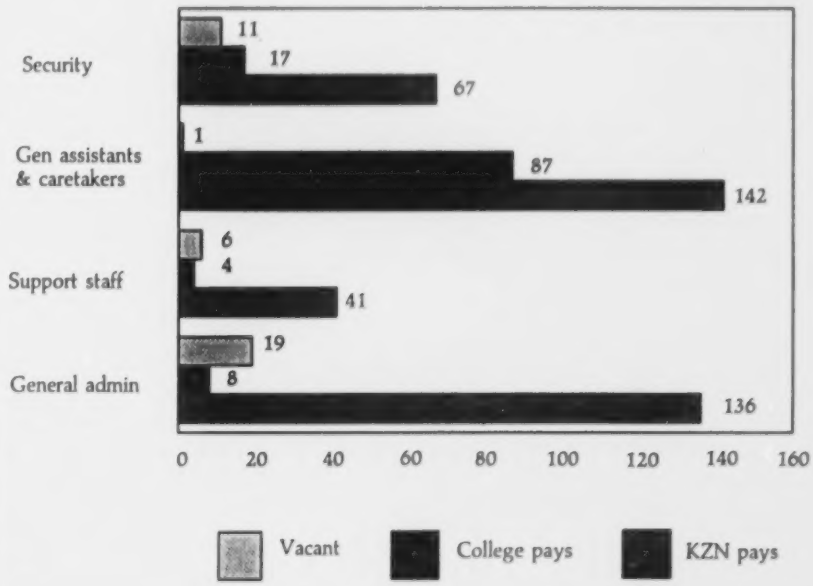
There are 423 administrative posts on the establishment of technical colleges in KwaZulu-Natal of which 37 are vacant. These vacancies are due to a moratorium on the filling of such posts.

5.5.2 Non-teaching posts paid for by college

The colleges employed 117 administrative personnel from their own funds. The majority of these appointments were for additional

general assistants for cleaning purposes and additional security personnel. The colleges employed only eight additional clerks and typists. There was no evidence that the colleges employed additional senior administrative staff at administrative officer or assistant director level.

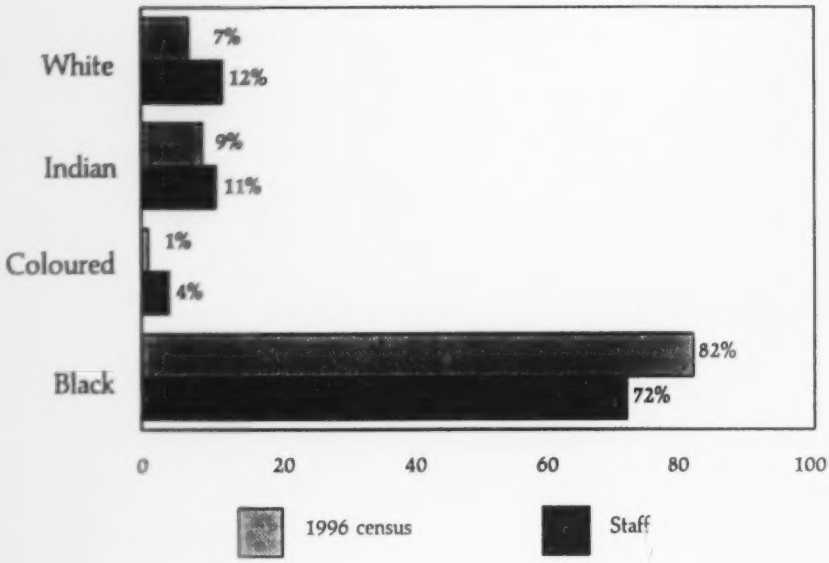
Figure 5.5.2: Payment of non-teaching staff



5.5.3 *Non-teaching staff by racial classification*

Figure 5.5.3 compares the racial composition of the non-teaching staff with the racial composition of KwaZulu-Natal based on the 1996 population census. The non-teaching staff is more representative of the population than the teaching staff but the representivity is almost entirely due to the fact that cleaners and ground staff are drawn from blacks who are underrepresented among the senior administrative personnel.

Figure 5.5.3: Racial classification of non-teaching staff



5.5.4 *Non-teaching staff by home language*

The home language of the administrative staff follows the home language spoken in KwaZulu-Natal more closely than is the case with the teaching staff. Nevertheless isiZulu speakers are under-represented and English and Afrikaans speakers are overrepresented.

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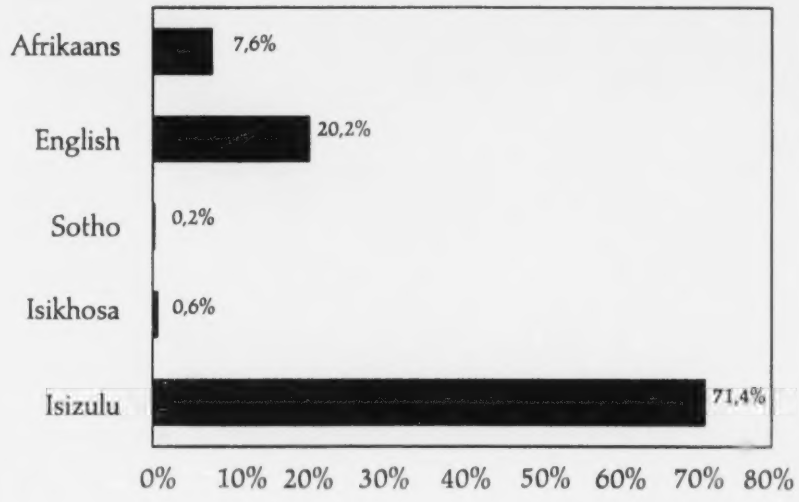
Figure 5.5.4: Home language of non-teaching staff



5.5.5 *Ratio of administrative posts to FTEs*

Clearly, there is a relationship between the number of administrative personnel and the number of students. The relationship is not direct because a certain basic infra-structure is required irrespective of the size of the institution. Norms do not exist for the ratio of administrative personnel to FTEs and it would be misleading to quote a figure that includes all categories of personnel. It would be more meaningful to determine the ratio of general administrative staff and support staff to FTEs, excluding general assistants, ground staff and security personnel.

The ratio of FTEs to general administrative and support staff varies enormously in state and state-aided colleges. It ranges from 16:1 (Sivanda Technical College) to 234:1 (KZN Midlands Technical College). Both are exceptions to the provincial norm which is 80:1.

The former is probably due to the very small number of FTEs; the latter has only two administrative clerks and no support staff for a college with 468 FTEs.

5.5.6 *Inadequate administrative staffing*

Colleges are inadequately staffed with administrative support personnel. The number of senior administrative posts is too small and the administrative burden is being carried by senior teaching staff. An example will be used to illustrate the seriousness of the situation: Cato Manor Technical College reported that in March 1998 it had eight general administrative posts vacant and four support staff positions vacant. This meant that it was operating with a significant proportion of its administrative and support posts vacant. Cato Manor reported that ten of its most senior teaching staff were not teaching at all, but were spending all of their time on administrative duties.

Table 5.5.5: Ratio of FTEs to administrative and support staff

College	FTEs*	General administration plus support staff	Ratio FTEs to administration plus support staff	Classification
Durban Technical College	1 177	9	131:1	State-aided
Durban Central Technical College	691	6	115:1	State-aided
Richtek College Of Vocational Education	848	7	121:1	State-aided
Ladysmith Technical College	315	5	63:1	State-aided
Newcastle Technical College	728	6	121:1	State-aided
Msunduzi Technical College	540	11	49:1	State-aided
Pinetown Technical College	467	9	52:1	State-aided
Port Shepstone College	448	4	112:1	State-aided
Vryheid Technical College	261	3	87:1	State-aided
Swinton Road Technical College	1 255	16	78:1	State
Cato Manor Technical College	1 535	21	73:1	State
L C Johnson College	663	7	95:1	State

Edendale Technical College	280	8	35:1	State
Ntuzuma Technical College	310	7	44:1	State
Madadeni Technical College	1 007	6	168:1	State
Ezakheni Technical College	110	2	55:1	State
St Oswalds Technical College	638	4	160:1	State
Nongoma Technical College	381	8	48:1	State
Sivananda Technical College	98	6	16:1	State
KZN Midlands Technical College	468	2	234:1	State
Northdale Technical College	870	11	79:1	State
Plessislaer Technical College	603	14	43:1	State
Umlazi Technical College	1 018	13	78:1	State
Enyenyesi Technical College	379	4	95:1	State

* Based on KZN Department of Education data

5.6 STUDENTS

5.6.1 FTEs and headcount

In this study, the analysis of student numbers is based on full-time teaching equivalents or FTEs. The weighting used to determine the number of FTEs is the official weighting of national Department of Education found in the NATED191 document. Determination of FTEs using the NATED191 weightings differs slightly from the approach used by the KZN Department of Education, which weights practical workshops more highly than theory subjects. Any table using KZN Department of Education weighted FTEs will be clearly marked. In practice the FTEs calculated by the KZN Department of Education will be higher if the college has a large workshop component, otherwise there should be close correspondence. There is close correspondence between the KZN Department of Education's figure for FTEs and the figure based on the college data using the NATED191 weighting.

In 1997 there were approximately 14 020 FTEs in the 25 technical colleges in KwaZulu-Natal. This is an approximate figure because data from four colleges were so unreliable and inaccurate that the

FTEs used in this study had to be based on DNE examination enrolment figures for these colleges. It is estimated that the maximum error in the FTE count is 5%.

A comprehensive analysis of headcount and FTEs is found in Table A.5.6.1 – Table A.5.6.5 in the appendix. These tables have been constructed so that each table aggregates the data at increasing levels of detail.

- Table A.5.6.1 considers the whole province and divides KwaZulu-Natal into the FET and HET bands.
- Table A.5.6.2 divides the province into colleges and divides each college into the FET and HET bands.
- Table A.5.6.3 divides each college into vocational fields, which are then divided into the FET and HET bands.
- Table A.5.6.4 summarises the programmes presented at each college.
- Table A.5.6.5 further divides each programme into instructional offerings.

5.6.2 *Part-time and full-time study*

Some 93% of the students are engaged in full-time study and 7% are studying on a part-time basis. Of the 25 technical colleges in KwaZulu-Natal, nine have enrolled part-time students but of these only four have part-time enrolments in excess of 500. The reasons for this are complex, and clearly security of staff and students has something to do with it in a province that has seen so much violence and death. Nevertheless, it does suggest that technical colleges in KwaZulu-Natal have not gone far enough in extending their programmes to a wider group of possible students who can attend classes only on a part-time basis.

5.6.3 Gender breakdown

Sixty one percent of the total student enrolment is male. This must be interpreted with caution because gender imbalance is almost entirely due to the high percentage of males in Engineering programmes at N1, N2 and N3 levels. There are more females (55%) than males (45%) in the higher education programmes. Females are in the majority in each vocational field except Engineering Studies. There are significantly more part-time male enrolments in the FET band but the opposite is the case in the HET band. Table 5.6.3 gives a detailed breakdown of the percentage of males and females at each programme level.

Table 5.6.3: Gender analysis of part-time students by programme level*

Programme level	Males	Females	Total	%Males	%Females
Pre-N1	605	220	825	73%	27%
N 1	2 084	292	2 376	88%	12%
N 2	1 082	373	1 455	74%	26%
N 3	857	343	1 2 00	71%	29%
NSC	244	636	880	38%	72%
Subtotal N 0 -> NSC	472	1 864	6736	72%	28%
N 4	1 250	1 741	2 991	42%	58%
N 5	552	545	1 097	50%	50%
N 6	344	362	706	49%	51%
Subtotals	2 146	2 648	4 794	45%	55%
Totals	7 018	4 512	11 530	61%	39%

* Based on returns from 20 colleges

5.6.4 Further and higher education bands

Sixty-eight percent of the FTE enrolments are in the FET band and 32% in the HET band. Table 5.6.4.1 further divides the two FET and HET bands into five vocational fields.

Table 5.6.4.1: Headcount and FTEs by vocational field and by FET/HET bands

Vocational field	FET band		HET band	
	Headcount	FTEs	Headcount	FTEs
	FT + PT		FT + PT	
Business Studies	9 336	2 675	20 028	2 917
Educare	80	16	929	116
Engineering	54 352	5 656	13 060	1 334
Utility Industries, Arts	3 712	978	1 043	141
General Education	754	189	N/A	N/A
Totals	68 234	9 513	103 294	4 508
		68%		32%

5.6.5 Racial composition of students

Fourteen of the 25 colleges provided information based on the racial classification of the students. However, the sample is large and the 14 colleges are sufficiently representative of the college sector for the findings to be valid.

Table 5.6.5: Racial composition of students*

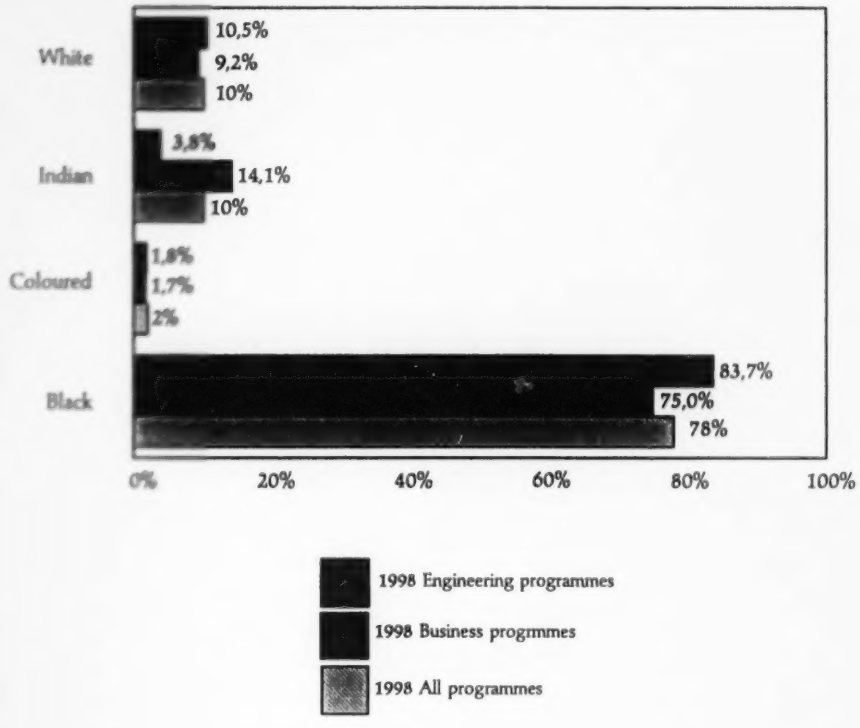
Racial Classification			
Black	Coloured	Indian	White
78%	1,8%	9,8%	10,3%

* Based on 14 colleges, 9 903 student headcount

Although small variations exist, the racial composition of the students remains remarkably constant across Business Studies, Engineering and the other vocational fields. Figure 5.6.5 compares

the racial composition of Business Studies and Engineering with the racial composition of all programmes.

Figure 5.6.5: Racial composition of programmes



5.6.6 Home language of students

The home language of technical college students follows the home language of the KwaZulu-Natal population. IsiZulu is the home language of 63% of the students, English 25%, Afrikaans 4% and isiXhosa 5%. According to the 1996 population census, IsiZulu is the home language of 79,8% of the population in KwaZulu-Natal, English of 15,8%, Afrikaans of 1,6% and of isiXhosa also of 1,6% of the population.

Figure 5.6.6.1: Home language of students (all programmes)

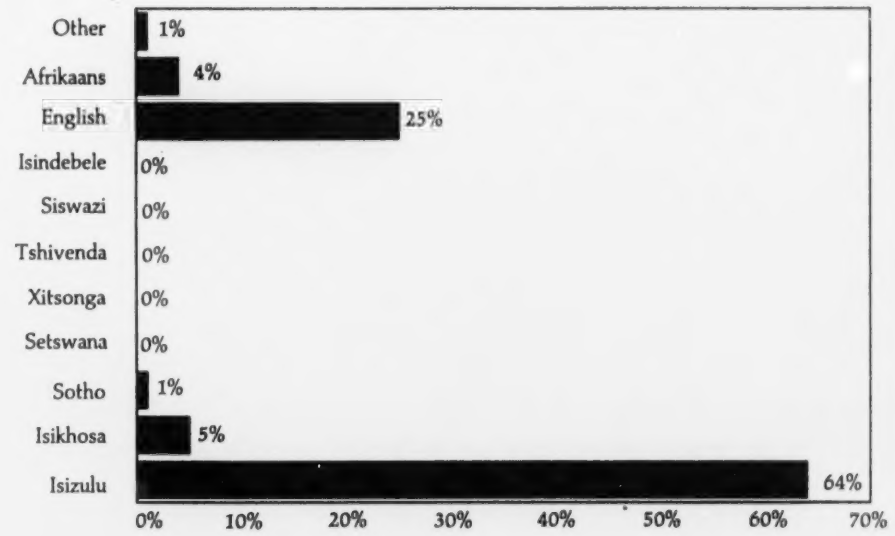


Figure A.5.6.6.2 to Figure A.5.6.6.5 in the appendix give the breakdown of the home language of students in Engineering, Business Studies, Social Sciences and Utility Industries. In Social Sciences and Utility Industries, blacks are not as well represented as they are in Business Studies or Engineering. The only programmes where the racial composition departs significantly from the general trend is in the Visual and Performing Arts where very few black students have enrolled.

5.6.7 *Changing racial composition of students*

Fourteen colleges were able to provide information on the changing racial composition of the students from 1996 to 1998. There has been considerable growth in the number of black students in all vocational fields except Social Services. The increase in black enrolments has been matched almost exactly by the decrease in the number of coloured and Indian students. Particularly significant is

the almost 50% decrease in the number of coloured and Indian students in Engineering. There has been a small decrease in the number of white students. There is a very similar pattern in the other vocational fields.

Table 5.6.7: Changing racial composition of students by vocational field*

	1996				1998			
	Black	Co-loured	Indian	White	Black	Co-loured	Indian	White
Engineering	3 117	347	1 510	463	4 086	90	766	503
Business	2 795	229	194	709	3 354	73	153	422
Utilities	162	13	110	97	172	11	50	101
Social Services	119	3	24	0	105	0	5	0
Totals	6 193	592	1 823	1 269	7 717	174	974	1 026

* Based on 14 colleges

Figure 5.6.7.1 shows the change in the racial composition of the students in all programmes while Figure 5.6.7.2 and Figure 5.6.7.3 indicate the changes in Engineering and Business Studies.

Figure 5.6.7.1: All programmes: changing racial composition of students, 1996-1998

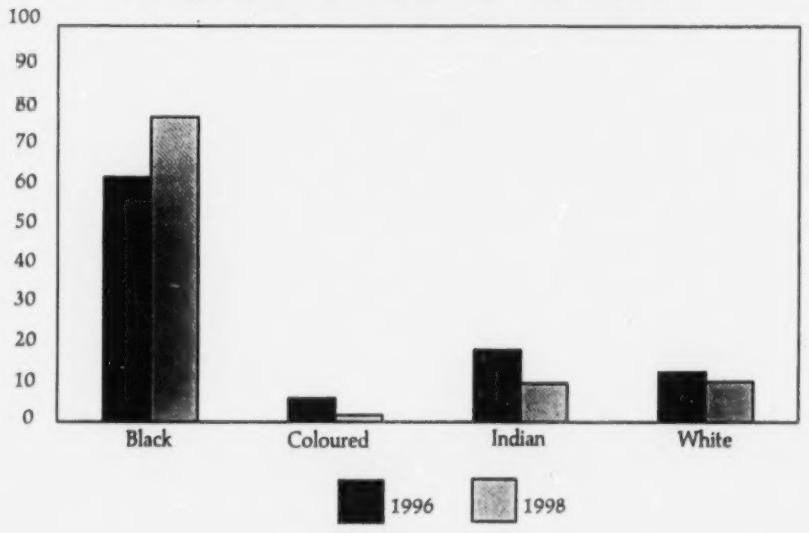


Figure 5.6.7.2: Engineering Studies: changing racial composition of students, 1996-1998

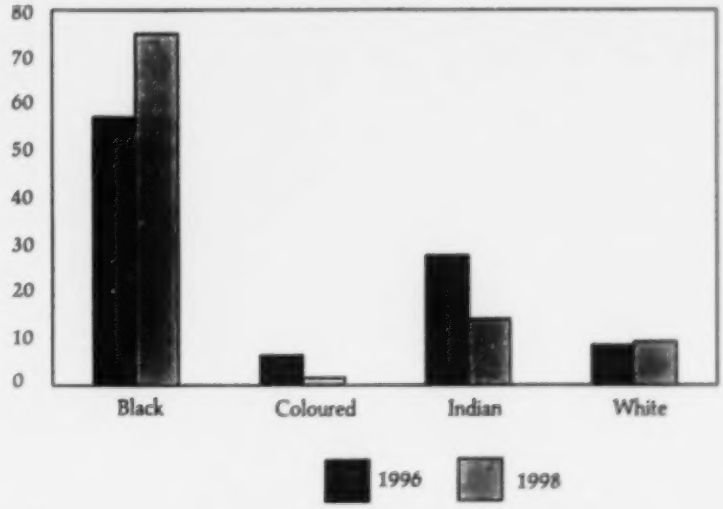
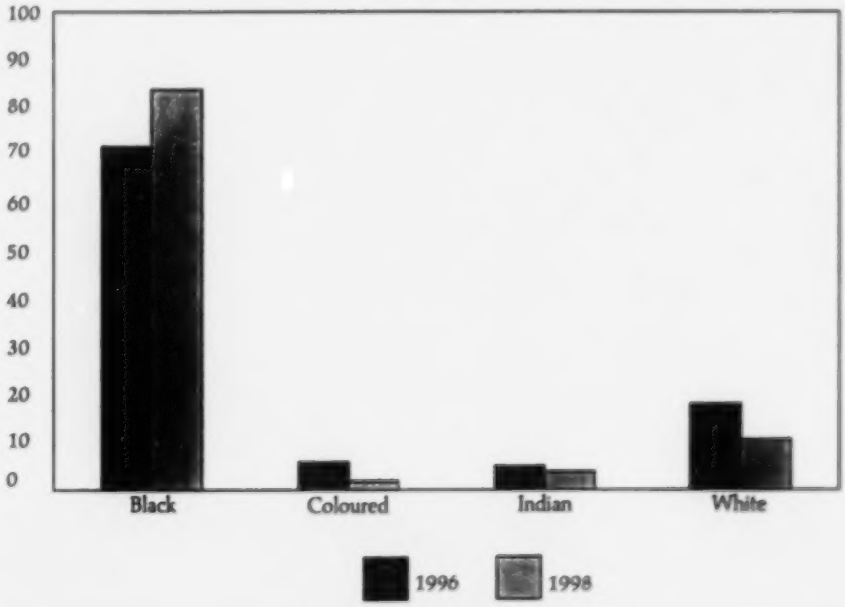


Figure 5.6.7.3: Business Studies: changing racial composition of students, 1996-1998



5.6.8 Age profile of students

The vast majority of students (87%), across the five vocational fields, are clustered in the age group 17-26 years. Only 8% of the students are 30 years or older and it is clear from the age distribution that colleges have not been able to broaden their participation to include more mature students.

Figure 5.6.8.1: Age profile of students (all programmes)

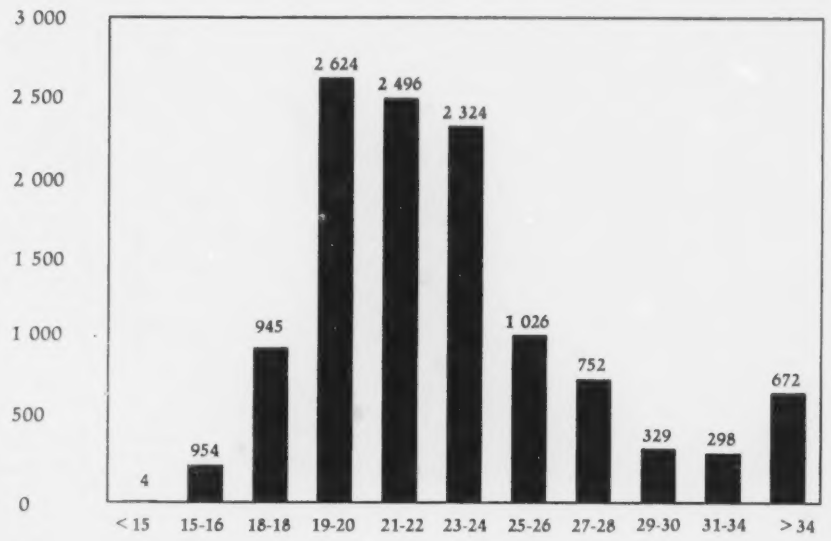
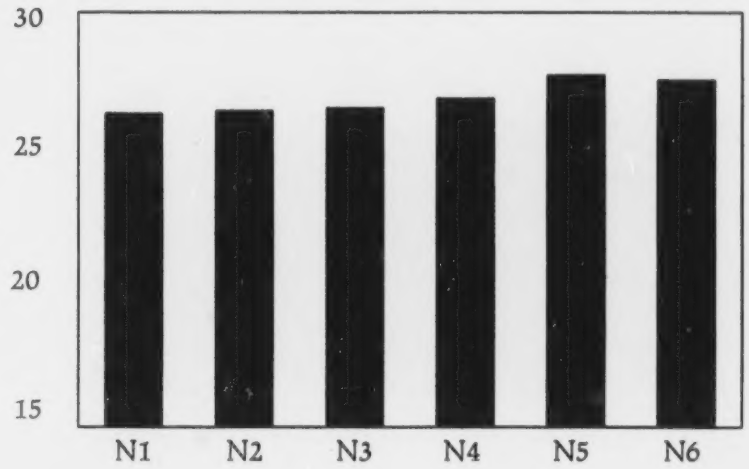


Figure 5.6.8.2 shows that the majority of students are progressing through the various levels from further education through to higher education. There is no indication that large numbers of mature students are joining the programmes at N4 level. There is a slight anomaly in the average age of students at the N5 level, but there is no obvious reason why these students are approximately a year older than expected.

Figure 5.6.8.2: Average age per N-level (all courses)



5.7 STUDENT PERFORMANCE

5.7.1 Nature and scope of the national examinations

In KwaZulu-Natal in 1997 there were 128 095 examination enrolments in 6 007 instructional offerings. Some of the instructional offerings are examined annually in November for the year programmes, some twice a year for the semester programmes and, as is the case of Engineering, examinations take place three times during the year. The organisation of these examinations is a complex and time-consuming undertaking that makes considerable demands on the limited resources of the colleges. Engineering dominates the whole examination process with approximately 75% of the 6 007 instructional offerings coming from this vocational field.

Table 5.7.1: Instructional offerings by vocational field, subfield and certificate level*

FET/HET split	Subfield	Level	Total number of instructional offerings	Total exam enrolments for all instructional offerings	Percentage of the total exam enrolment
Further education	Business Studies	N1	55	1 650	1,3%
Further education	Business Studies	N2	90	2 915	2,3%
Further education	Business Studies	N3	162	4 775	3,7%
Further education	Social Services	N2	4	64	0,0%
Further education	Social Services	N3	18	148	0,1%
Further education	Engineering & Science	N1	876	31 204	24,4%
Further education	Engineering & Science	N2	963	22 664	17,7%
Further education	Engineering & Science	N3	881	16 820	13,1%
Further education	Utility Industries	N2	4	194	0,2%
Further education	Utility Industries	N3	22	384	0,3%
Higher education	Business Studies	N4	484	17 889	14,0%
Higher education	Business Studies	N5	299	6051	4,7%
Higher education	Business Studies	N6	262	2404	1,9%
Higher education	Social Services	N4	33	402	0,3%
Higher education	Social Services	N5	11	168	0,1%
Higher education	Social Services	N6	16	288	0,2%
Higher education	Engineering & Science	N4	713	10 581	8,3%
Higher education	Engineering & Science	N5	552	5 610	4,4%
Higher education	Engineering & Science	N6	307	3 191	2,5%
Higher education	Utility Industries	N4	22	380	0,3%
Higher education	Utility Industries	N5	19	197	0,2%
Higher education	Utility Industries	N6	14	116	0,1%
	Totals			128 093	100%

* Based on information provided by DNE

5.7.2 *Reliability of examination information*

Students who enrol for the national certificate programmes write national examinations set by the national Department of Education. The results of these examinations are normalised in much the same

way that the matriculation examinations are normalised. Colleges are provided with comprehensive information on the results of the examinations. This information reaches the colleges on a regular basis and it was assumed that the colleges had assimilated the information and that it would be readily available this proved not to be the case. In a number of cases, the examination information requested in the questionnaire was either not provided by the college or was so incomplete as to be meaningless. In those colleges where the data were not provided by the college, the examination information was obtained from the national Department of Education examination database.

As a check on the reliability of the examination data provided by each college, the examination pass rate and the throughput rates obtained from the national Department of Education were compared with the data provided by the college. Many of the differences can be explained by the fact that the technical colleges serve as examination centres and there are students who write at a college but who may not have studied at the college. Another possible explanation is that colleges were selective in the results they submitted.

Table A.5.6.2.1 and Table A.5.7.2.2 in the appendix give details of the pass and throughput rates based on information provided by the college and the pass and throughput rates based on the national Department of Education data. In the case of two colleges there are major differences that cannot be explained.

5.7.3 Examination pass rates and throughput rates

In analysing the pass rates of any institution there are two approaches: The first considers the number of students who actually wrote the examination and calculates the examination pass rate as the number of students who passed the examination divided by the number that wrote; the second considers the number of students

who registered for the course and calculates the throughput rate as the number of students who passed the examination divided by the number that registered at the start of the programme. The examination pass rate does not take into account the dropout that occurs during the course of the year; the examination pass rate will always be higher than the throughput rate unless every student who registers for a course actually writes the examination. It may be argued that the throughput rate reflects more accurately the ultimate success of any institution. Examination pass rates and throughput rates will be used in this report.

Based on the information provided by the colleges the overall examination pass rate for KwaZulu-Natal was 66% while the throughput rate was 61%. This compares favourably with provinces such as Gauteng. It would be dangerous to generalise about the examination pass rates. Table 5.7.3.1 and Table 5.7.3.2 divide the examination results into the FET and HET bands and give the examination pass rates for Engineering, Business Studies, and Utility Industries. Engineering pass rates are consistently lower than other vocational fields. With the exception of Engineering, the pass rates in the HET band are higher than in the FET band.

Table 5.7.3.1: FET band examination results

All courses	Business	Engineering	Utility Industries, Soc Sciences and Arts
64,3%	71%	62%	72%

Table 5.7.3.2: HET band examination results

All courses	Business	Engineering	Utility Industries, Soc Sciences and Arts
70%	75%	60%	73%

The examination pass rates vary widely from college to college. Table 5.7.3.3 illustrates the difference in the examination pass rates between the college achieving the highest pass rate and the college with the lowest pass rate. There is some excellent teaching taking place in the colleges that achieve these high examination pass rates, but equally there are a number of technical colleges whose pass rates are unacceptably low.

Table 5.7.3.3: Highest and lowest examination pass rates

Band	Vocational field	Highest examination pass rate	Lowest examination pass rate
FET	Engineering	75%	43%
	Business	94%	32%
	Utility & Soc Sciences	95%	44%
HET	Engineering	70%	39%
	Business	91%	50%
	Utility & Soc Sciences	89%	40%

Table A.5.7.3 in the appendix gives, for each college, the examination pass rates and throughput rates aggregated by vocational field and programme level. Table A.5.7.4 in the appendix further divides each programme into instructional offerings. This table highlights the differences within a college where the examination pass rate, in a programme such as N3 Engineering, can vary from a 100% pass rate to a 20% pass rate. Four colleges did not include the number of dropouts and therefore the examination pass rate and the throughput rate are the same.

5.7.4 Comparison between national averages and KZN examination averages

Using the examination data from the national Department of Education it was possible to determine the average mark obtained for each instructional offering and compare the national average with the average for KwaZulu-Natal. Table A.5.7.5 in the appendix gives the number of students who wrote, the number who passed, the average mark of those who wrote and the percentage pass at national and at provincial level. In more than 95% of all instructional offerings, the provincial average mark was equal to, or better than, the national average. The provincial average was significantly less than the national average in less than one percent of the instructional offerings. These results reflect favourably on the technical colleges in KwaZulu-Natal.

5.8 GOVERNANCE OF TECHNICAL COLLEGES

5.8.1 Establishment of college councils

All colleges have governing councils. State-aided colleges have had councils in place for considerably longer than state (former DET) colleges and, not unexpectedly, these councils gained valuable experience over the years. It has only been since 1994 that the councils of state colleges have received certain powers from government to administer their own affairs.

5.8.2 Racial composition of the college councils

Racial imbalances exist in the composition of the college councils: 49% of council members are white, 32 % are black, 14 % are Indian and 5% are coloured. Table A.5.8.2 in the appendix gives full details of the racial composition of the college councils in terms of the constituencies that the council members represent. Student

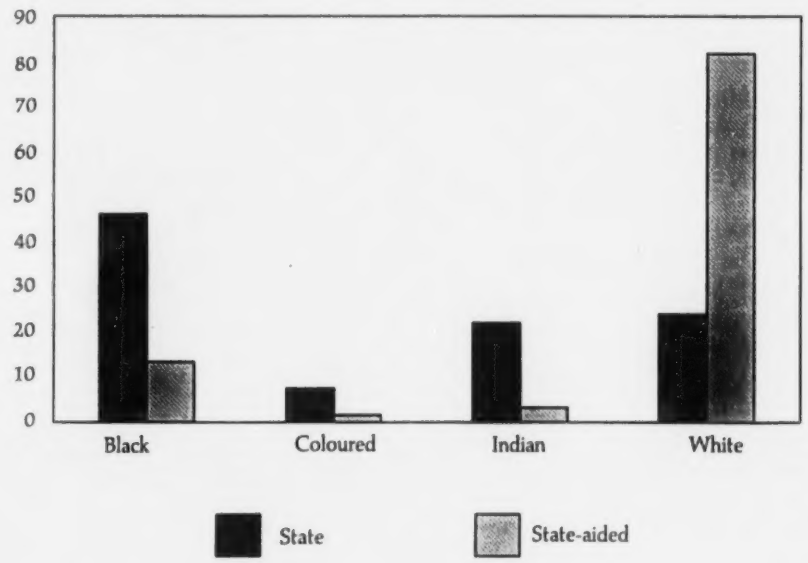
representatives are the only members that reflect the racial composition of the population in KwaZulu-Natal.

Table 5.8.2: Racial composition of college councils

Black	Coloured	Indian	White
32%	5%	14%	49%

The distribution of college council membership according to race in state-aided and state colleges is illustrated in Figure 5.8.2.1

Figure 5.8.2.1: Racial composition of college councils (state vs state-aided)



The councils of state-aided colleges are neither representative of the students attending the colleges nor are they representative of the communities that the colleges are serving. Table 5.8.2.2 gives an indication of the gross racial imbalances that exist.

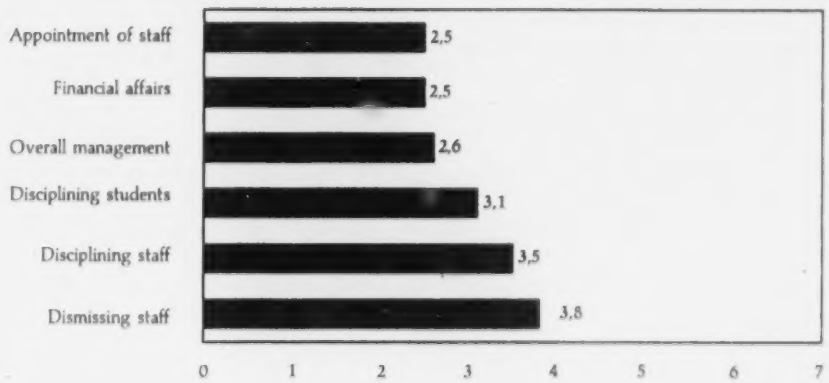
Table 5.8.2.2: Racial representivity of state-aided college councils by constituency

Constituency	Number of blacks	Number of whites
Principals and vice-principals	0	13
Ministerial nominees	2	18
College senates	0	9
Academic staff	0	8
Business	5	31
Students	6	6
Administration	0	7

5.8.3 *Authority of college councils*

Apart from the ultimate responsibility for the overall management of the college, the college councils assume responsibility, in varying degrees, for the appointment of staff, the disciplining of staff, the disciplining of students and the control of the college finances. Figure 5.8.3 illustrates the authority that the colleges believe their councils exercise. (A scale value of 1 indicates total authority, 2 considerable authority, 3 some authority, 4 little authority and 5 no authority.)

Figure 5.8.3: Authority of college councils



5.8.4 College senates/academic boards

Academic boards or senates assume responsibility for academic matters and form an integral part of the management structures of the colleges. Apart from the SRC representatives on these boards, the representatives of the various constituencies neither reflect the student population nor are they representative of the communities served by the college. Table 5.8.4.1 gives the racial composition of the academic boards.

Table 5.8.4.1: Composition of college academic boards

	Black	Coloured	Indian	White
Principal	6,7%	13,3%	13,3%	66,7%
Council reps	25,0%	3,1%	9,4%	62,5%
Academic staff	6,1%	7,0%	27,8%	59,1%
SRC	72,4%	0,0%	0,0%	27,6%
Other	21,1%	7,6%	20,0%	52,9%
Totals	19,5%	7,6%	20,0%	52,9%

5.9 FINANCE

5.9.1 Differences between state and state-aided colleges

Significant differences have developed historically between state colleges and state-aided colleges. State colleges enjoyed very little, if any, financial autonomy. The education departments paid the salaries and all items of expenditure were controlled by the education departments in terms of a budget that was granted to each college. These budgets were limited and severe restrictions were placed on the amount of money available for state colleges. State colleges did not employ staff and they had control over only very small amounts of money collected from students.

State-aided colleges enjoyed a degree of financial autonomy. Fees were collected from students and the college was expected to manage its own financial affairs. They were free to purchase goods without the direct consent of the educational authorities and could employ additional staff. The salaries of the teaching and administrative staff were paid by the education departments. State-aided colleges enjoyed many financial advantages in terms of the money spent at these colleges.

5.9.2 College budgets

The size of the college budget depends on whether the college is a state college or a state-aided college. State colleges remit all course and examination fees to the treasury. The college budgets in KwaZulu-Natal range from R30 000 for a small state college, to R3 300 000 for a large state-aided college. Major items on the budgets of state-aided colleges include salaries paid to additional staff employed by the college, upkeep and maintenance, and capital projects.

5.9.3 Financial administration

In the past state colleges were not given the opportunity to develop the necessary financial skills to manage their own financial affairs. Despite this there is today a strong call by principals for greater financial autonomy. Principals are willing to assume this responsibility and, in the opinion of the principals, the colleges are able to conduct their own financial affairs. Eight principals indicated that they were able, without reservation, to assume greater financial responsibility. 13 indicated that they were willing to do so but admitted they had administrative shortcomings. Three principals believed that it could not be done with the present administrative capabilities.

5.10 FACILITIES

5.10.1 Teaching and administrative infrastructure

Technical colleges are complex institutions providing a wide range of different programmes that require specialised facilities. Colleges rate the condition of the teaching facilities as "acceptable" with very few examples of "poor" or "very poor" facilities. The facilities are relatively modern with an average age of between 20 and 30 years. Table A.5.10.1 in the appendix gives a detailed analysis of the number, the average capacity, age, condition and utilisation of the various teaching and administration facilities.

5.10.2 Utilisation of facilities after hours and during vacations

The teaching facilities are used on average seven hours a day during term time. However, the situation changes if one considers the after hour and vacation use that the community makes of the facilities. There is little evidence that college facilities are used either after hours or during the vacations. The local communities do not use facilities such as the hall and the cafeteria. The colleges estimate that on average the communities use the hall and cafeteria once every six months. Security of the average buildings and the equipment is a possible explanation for the non-use of these resources.

5.10.3 Boarding facilities

Six technical colleges provide boarding facilities. The total number of places far exceeds the number of students seeking accommodation. The excess is probably due to the inability of students to pay the boarding fees. Table 5.10.3.1 gives details of the accommodation available.

Table 5.10.3.1: Boarding facilities

	Men	Women	Total
Maximum number that can be accommodated	1 020	195	1 215
Number accommodated	413	146	559
Surplus accommodation	607	49	656
Number on waiting list	0	0	0

The colleges reported that the condition of the boarding facilities ranged between "good" and "satisfactory". Msunduzi Technical College was the only college that consistently reported that their boarding facilities were in a "poor condition". There were no examples of colleges reporting that their boarding facilities were "not suitable for accommodation".

5.10.4 Sporting Facilities

Very few students actively participate in sporting activities at the technical colleges in KwaZulu-Natal. Apart from soccer and volleyball there is no apparent need to provide sporting facilities at the colleges. In all of the colleges fewer than 500 students participated in the eight sports on offer. Colleges rate the available sporting facilities as "satisfactory" and indicate there is a need only for soccer, volleyball and perhaps netball facilities. Whatever the reason may be, sport is not a high priority in the lives of the students attending technical colleges in KwaZulu-Natal.

Chapter 6

LEARNING, TEACHING AND MANAGEMENT ENVIRONMENT: EVIDENCE FROM QUALITATIVE STUDIES

Andre Kraak

6.1 INTRODUCTION

This section of the report provides a qualitative insight into the role and contribution of the key stakeholders in the technical college sector in KwaZulu-Natal. It begins by focusing on the leadership style and effectiveness of college managements and college councils. The contributions of academic staff are also looked at. The discussion then shifts to students and their social, political and learning environments. The chapter concludes by examining stakeholder perceptions of the KZN Department of Education.

The identity of the colleges under review is kept confidential for reasons outlined in Chapter One. The methodological style employed in this chapter and in Chapter Seven is to cite the field notes of those researchers who visited the particular colleges. The ethnographic 'voices' heard, therefore, are those of the field

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researchers who interviewed a wide range of stakeholders at each campus and made detailed site investigations of college infrastructure.

6.2 LEADERSHIP STYLE OF THE TECHNICAL COLLEGES IN KWAZULU-NATAL

A continuum of leadership styles can be identified in the KZN colleges sector – from managements that are highly competent although autocratic and 'old school' in their methods, to managements that are more consultative and team oriented, to managements that are passive and dependent on the state for assistance. These leadership styles cut across the old apartheid departmental categories although the majority of weak and dependent colleges tend to be ex-DET and KwaZulu homeland institutions, whilst the majority of effective (although mostly autocratic) colleges tend to be the ex-House of Assembly institutions. Such a continuum is reflected in Table 6.2 below:

Table 6.2: Continuum of college leadership styles

College	Effective yet autocratic management	Consultative, team-oriented-management	Passive, dependent, management
A	X		
B	X		
C	X		
D		X	
E	X		
F			X
G			X
H		X	

I			X
J	X		
K			X
L			X
M			X
TOTAL: 13	5	2	6

To make sense of these widely divergent leadership styles, three distinct modes of management have been identified: 'non-consultative yet effective', 'consultative-team oriented' and, finally, a 'passive-dependent' mode.

6.2.1 Effective management

It is important to note that the causes of dependent management are not simply historical, i.e. the result of apartheid's racial categorisation of institutions. The following descriptions of two colleges visited illustrate this point:

Institution One

The institution is well managed and well resourced with competent staff who achieve good academic results. It exudes a confidence that it is the best college in town. It has a powerful 'self-help' philosophy whereby staff take the initiative to get things done and are not dependent and reliant on other agencies. Good management appears to have been inherited historically because the benefits of many years of solid management are very evident in the physical infrastructure and confidence of the staff.

Institution Two

The college exudes an air of being well managed. The council drives all decisions, although it seems that most major decisions are actually taken by the chairperson and the

principal at weekly meetings usually held at the chairperson's office. The college is well connected and also well funded. There is an air of pride and achievement and an overall culture of knowing what they are there for and what they are doing.

The illuminating factor in the above descriptions is that the former institution is an ex-DET (African) college and the latter is a former ex-HoA (white) college. They appear similarly well managed. As can be seen from Table 6.2, at least 5 of the 13 colleges visited fall into this 'effective management' category.

6.2.2 Non-consultative yet effective management

Unfortunately, this managerial effectiveness is usually underpinned by the predominance of an overlapping 'autocratic' style. Few colleges appear to have adopted the flattened managerial hierarchies and teamwork strategies that have become popular in cutting-edge business practice today (Mathews, 1989; Kraak, 1996). The idea of a more consultative and participatory work organisation appears only to be a rhetorical device in the KZN technical colleges with very little real meaning in practice. Below are some observations concerning three different colleges visited in KwaZulu-Natal:

Institution One

There is an overall atmosphere of an institution that is run efficiently. Management systems are in place although they seem school based, rule bound and rigid. The management style and communication appear very top-down in nature. Interestingly, the college is housed in an old primary school. This contributed to a feeling that the college was run like a

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school rather than a post-school institution. Bells are still rung for the start of lectures and intervals.

Institution Two

The management of the college appears capable, although autocratic. There is little staff involvement in the normal running of the college, even though staff are involved in various committees. There was a feeling that the staff are powerless. Ironically, the management described their policy as open door while the staff viewed it as autocratic.

Institution Three

The college is characterised by a powerful duality: On the one hand, it appears to be a well-functioning college and, on the other, it is pervaded by a strong 'us and them' attitude. This attitude lurks beneath the surface and is most clearly understood by the students who feel that they are being governed by a strict moral code which does not recognise their maturity and adulthood, and one which cannot deal with their cultural diversity and political value system.

It is clear that such features of autocracy undermine the more positive assessments of these colleges, especially their effective governance. The causes are varied. Certainly, modern management methods that emphasise teamwork, delegation and flattened supervisory structures have not made their mark on the colleges sector. Secondly, the bureaucratic, rule-bound approach to management that reached its peak in the late apartheid years has left many staff members lethargic, passive and dependent, forcing management to be more unilateral in their actions. To complicate matters further, in some cases, college power appears to rest in personalised fiefdoms rather than in clearly demarcated management line functions, allowing certain individuals to assert unsanctioned

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personal authority. And lastly, it is clear that new, complex and highly racialised social relations have emerged across the college sector over the past four years characterised by deep cleavages between a largely non-African staff establishment and a predominantly African student population. All of these factors militate against a consultative management mode.

6.2.3 Consultative management

Nonetheless, there is a definite, albeit small shift towards a more consultative team-oriented management model emerging in some of the colleges in KwaZulu-Natal. This tendency is best illustrated in this description of one college:

> The college is headed by a principal and assisted by two heads of department (HoD) who represent the two study fields (Commercial Studies and Engineering Studies). Members of top management support each other optimally and are respected by other staff members and the students. The leadership style of the college seems to be democratic in nature giving all staff members ample opportunity to participate in decision-making processes and the day-to-day management of the college. Staff members are given the opportunity to serve on different committees and participation is recognised. Each year in November all staff members participate in strategic planning for the next year.

The principal in the above case study is the kingpin in the college structure, creating its ethos and image. His authoritative control has earned him the trust and respect of all staff members. This respect appears to be achieved through collaboration and inclusion rather than coercion of colleagues and students. Consultative management was understood to mean greater staff involvement in the day-to-

day running of the college, more regular information sharing and open communication, and active stakeholder representation on academic boards and college councils, leading to higher staff morale and enthusiasm. These characteristics were identified in two of the thirteen colleges and emergent in a number of others.

6.2.4 Dependent management

Unfortunately, the number of colleges with effective leadership was equally matched by the number of colleges with passive and dependent leadership, as is evident in Table 6.2. The latter colleges have tended historically to emerge from the ranks of the non-House of Assembly institutions – i.e. they tend to come from the ex-HoD, HoR and DET categories. The following two case studies highlight the problems faced by five of the thirteen colleges visited:

Institution One

The researchers' perception of the college is that the dependence syndrome that originated from the former departmental legacy is still embedded in the life of the institution. This dependence is clearly evident in the great expectations staff have of the new government to deliver and solve all their problems. A second perception relates to time spent agonising on the state of disadvantage and how well and better off the neighbouring college is, instead of thinking of ways and means of working with that college. Almost every suggestion or strategy for growth and development was blocked by this culture of complaint and disadvantage. For instance, over the years the college has built up in its reserves, but, this money has not been used to improve basic infrastructure.

Institution Two

The management, particularly the principal, displays symptoms of helplessness and the 'victim syndrome'. There is no vision, nor any current efforts to maximise the utilisation of the modern and massive physical resources unique to their institution. Instead, much time is wasted on complaining.

There are many reasons for this state of helplessness. Some of the more important factors are, firstly, the historical baggage many of these institutions carry because of apartheid's deprivations and, secondly, the high leadership turnover in many of the colleges over recent months and years. The KZN Department of Education indicated that 16 of the 25 colleges have new principals, some of whom are inexperienced in managing complex organisations. Prior to their arrival, these colleges functioned with acting leadership in temporary posts – a scenario not conducive to institution building. In addition, in at least one institution, internal conflicts between differing staff groupings and between management and students have weakened the college considerably, leaving it directionless.

However, as this new leadership matures, and as internal conflicts subside, the conditions for effective leadership will emerge, particularly if the KZN Department of Education and other agencies provide substantial capacity building to these institutions.

6.3 OTHER KEY FEATURES OF COLLEGE MANAGEMENT

6.3.1 Strategic planning

It appears as if the continuum of leadership styles described above is replicated in a wide variety of management systems operative in these colleges. Our criteria for identifying the effectiveness of

management systems included the availability and relevance of a mission statement, strategic planning, the existence of active subcommittees and a management information system (MIS). Significantly, one of the colleges described as having a consultative team-oriented leadership style was also the college that had the most effective and inclusive management system:

> The mission statement was developed democratically approximately five years ago. It is revised annually in November. All stakeholders are involved in the revision. In addition, structures and processes are in place to ensure formal strategic planning activities. Staff meetings, division meetings and subject meetings are held at least four times a year. In November each year all staff members are involved in developing a year plan for the coming year.

This consultative mode contrasted sharply with the management practices in those colleges with autocratic leadership. Most institutions had a mission statement but, on closer scrutiny, it appeared as if staff and even council members were unaware of its significance and contents. Staff stated that they were not involved in the production of the mission statement. As a consequence, such mission statements are not living documents shaping management practices and objectives, but merely decorative plaques on board-room walls. In some cases mission statements had not been revised for several years. Strategic planning appeared to be done by small management executive teams with few ordinary academic staff members participating in the deliberations. The main function of most councils appeared to be to rubber stamp these decisions.

Predictably, the passive dependent institutions were in many cases without updated mission statements, with no planning activities taking place and with very little involvement of academic staff in

any management matters. Observations at one of these colleges concluded:

> Management described the college mission statement as being to 'equip students with practical components of whatever field they are engaged in'. They claimed that industry had been involved in the development of the mission statement, which had last been revised 'plus minus ten years ago'. The researchers at this college did not see this mission statement and suspect that even the stakeholders at the college have never seen it. Furthermore, the college staff seemed not to know what is meant by a mission statement, enquiring as to how it differed from the timetable and prospectus.

The texts of many mission statements collected in the research process were couched in the language of career education or the trade school ethic which sought to project trained college outputs into formal sector employment in manufacturing and commerce. Almost all of these mission statements spoke of relations with the community in very generalised ways without any specific reference to the precise community being served by the particular college. In reality, most of these colleges today have a majority of African students who live in black townships surrounded by abject poverty. Most of the students are unlikely to obtain jobs in the formal economic sector. Plans for black township community development and informal sector employment through SMMEs, job creation schemes and other self-employment strategies are not mentioned in these mission statements. This shortcoming poses the fundamental question of what role these institutions should be playing in South African society today.

6.3.2 Management information systems

The technical college sector is serviced countrywide by a management information system software package developed by a private company, Coltech. The decision to make use of Coltech resides with each college as it entails significant human resource development and financial investment by the institution. Most colleges in the KZN region have opted for Coltech, but as Table 6.3.2 reveals, four do not use it optimally. Three other institutions in the sample of 13 have not bought into the Coltech system at all.

Table 6.3.2: Availability and effective use of Coltech

College	Makes effective use of Coltech	Does not use Coltech optimally	Does not have Coltech
A	X		
B	X		
C	X		
D	X		
E	X		
F		X (Coltech new)	
G			X
H		X	
I		X	
J	X		
K			X
L		X (Coltech new)	
M			X
TOTAL	6	4	3

Coltech offers many management benefits: recording information on finances, students, student progress reports, class lists, examination permits, study cards, stocktaking, staff records and wages. Electronic databases of this kind facilitate strategic planning

and financial management. Coltech is most effective when it is backed up by a good information technology infrastructure. The college should be fully networked so that staff in different locations can access the system.

Coltech requires a certain level of personal computing (PC) expertise, particularly in working in a DOS environment. One ex-DET college appears to have the best IT infrastructure and is making the best use of Coltech in the province:

> IT is excellent at the college with fibre optic cabling installed in each classroom, workshop and administrative corner. The college is also linking up with satellite technology to promote teleconferencing and interactive distance education. Coltech is used by management for strategic and financial planning. The IT system is visible, up-to-date and up-and-running.

Apart from the above ex-DET college, Table 6.3.2 reveals that all five of the ex-HoA colleges are making effective use of IT and Coltech. Clearly, the possession of this computing infrastructure and the ability to use it optimally is a major factor in the effective management of these ex-HoA institutions. The same cannot be said for the non-HoA institutions, three of which do not have Coltech and a good IT infrastructure, and a further four that do not make optimal use of the technology available to them on campus. Reasons why these colleges function suboptimally are, firstly, because they do not have a fully networked IT environment (for example, some use Coltech on a stand-alone PC); secondly, they do not have a sufficiently trained staff cadre to make optimal use of the system; and lastly, the absence of strategic planning in these institutions suggests that key information questions are not being asked and therefore do not need to be answered. The result is poor information flow and suboptimal financial and strategic planning.

Information gathering at the three colleges without Coltech is done manually and as a consequence, slowly, with sometimes disastrous results in terms of financial planning and information flow. All of these institutions struggle to supply outside agencies such as the Department of Education or research institutions with accurate information.

Many college managements believe that Coltech should be used in partnership across colleges, provinces and with the national Department of Education. This would allow for regionally and nationally comparable data flow. At the moment Coltech is not centrally linked up, with the result that there is not an adequate national and regional MIS database for the technical colleges sector.

6.3.3 *Role of councils in institutional governance*

In many cases a harmonious and productive relationship has been established between college councils and senior management. This leads to improved financial and strategic planning and staff selection and appointment. Other council responsibilities are to manage tenders and draw up rules and regulations for college discipline and student behaviour. However, KZN Department of Education officials reported that a major problem confronting councils is the fact that five different governing systems (from the five former racially defined departments of education) have now to be amalgamated into one system. Indeed, as from 1 September 1998 all colleges have been deemed to be state-aided colleges. The officials interviewed were aware that not all colleges were on an equal footing, and a plan has already been devised for the training of college councils. This will include training on all aspects of managing a college, from the rules and regulations to strategic management and budgeting.

A second factor that has affected college governance in the province, and probably across the country, has been the remarkable state of flux and transition within the college sector leadership. Sixteen of the 24 state-funded technical colleges have new and relatively inexperienced principals. They have not had time to develop new management systems and establish sound management-council relations. The following ex-DET college experience illustrates these two difficulties:

> The acting college principal, who was formally appointed in April 1998, has never met members of the council. There is a feeling that in the past the council only received reports from the college principal and approved expenditure without much involvement or interaction. The current college council was appointed when the college was still a vocational school and, as a result, it serves both the college as well as the neighbouring technical high school. Some council members have died without being replaced, and as one council member put it, 'people are generally not keen to be involved.

A further problem is that most councils currently function as rubber stamps for management decision making. They are dependent on college management initiatives without much contribution from council members themselves in areas such as problem solving, strategising and decision making. In most cases, decisions are taken by the chairperson and one or two others who have a relationship with the principal through the council executive committee. Beyond these individuals, council members appear to be uninformed about their college's real needs and about new policy developments in FET. They are generally unrepresentative of the new constituencies many technical colleges are now serving. For example, there are few SMME stakeholders and experts on college councils. Those from industry tend to be either from parastatal organisations such as Iscor

and Eskom (who historically played a key role in supporting colleges in the development of the former apprenticeship system), or they are representatives of formal sector manufacturing and commercial enterprises. Some college principals indicated that they had encountered serious problems in constituting fully representative councils, given the shortage of community members who are properly informed about FET, the difficulties in the province concerning the political affiliation of nominees, the expectation of remuneration from community nominees for serving on councils, and, last but not least, the absence of new legislation defining the powers and responsibilities of publicly funded colleges in the new South Africa.

6.4 ACADEMIC STAFF

One of the more constructive features of the research findings is the positive regard councillors, senior management and students have for the lecturers – a sentiment expressed in most of the colleges surveyed. Lecturers were seen to act in a committed, experienced and professional manner in executing their academic duties. Students at one institution, for example, believed that

> ... their college had the 'best teachers'. They expressed their trust in them not only on an academic level, but also on a personal level with regard to the counselling they received from them about problems experienced at home and in their social life.

This view was echoed at many other institutions. A further characteristic, particularly of the workshop lecturing staff, was their preparedness to work after hours to maintain the college's infrastructure at minimal cost. This self-help ethos was evident at a number of colleges including the following ex-DET institution:

> The college exudes a confidence that it is the best in town. It has a powerful 'self-help' philosophy whereby staff take the initiative to get things done and are not reliant on other agencies. For example, workshop staff do much of the maintenance work around the college and build many of the items needed in the workshops and lecture rooms. This is not the practice at other institutions that are more dependent on the state to provide. The staff are innovative and seek ways to acquire materials at low cost for training purposes.

Effective teaching and practical training are evident also in the many creative innovations in the curriculum, teaching methods and educational technology at many of the colleges – innovations that will be examined in more detail later in this report. These innovations are significant because they arise as a result of the energetic efforts of dedicated lecturers rather than as a consequence of the institutional environment in which the lecturers work. Indeed, many of the working conditions of academic staff are antagonistic to innovation and creativity – thereby making their achievements even more important.

6.4.1 Staff development

Unfortunately, the positive message about the professional practice of teachers is not extended to other aspects of the teaching environment. In the field of staff development there are some innovative ideas in some institutions such as staff secondments to industry to brush up on practical skills and technological know-how. Other strategies include mentoring, whereby new and junior staff are attached to senior colleagues for an induction period.

However, the overwhelming reality is that there are no formal staff development strategies in any of the colleges visited. Some of the

principals and councillors interviewed believed that there was no need for such strategies. They argued:

> Building capacity by employing junior or inexperienced lecturers was not considered an option by the college as they employed only 'the best' due to the college's responsibility to provide effective services to their clients, the learners.

The implication that this attitude of 'employing only the best' meant that predominantly white personnel were being appointed to vacant posts and that the racial composition of the staff had not changed significantly in the past decade, passed most managements by. The idea that all college staff were competent and therefore not in need of staff development programmes was shared by a number of institutions. As a consequence, almost no college had an internal training programme of workshops and seminars on relevant topics such as the new policy environment in FET or technological advances in industry. Staff development activities, if they did occur, were of a much more ordinary and *ad hoc* nature. Some college councils voted a small amount of between R10 000 to R20 000 per annum for staff attendance at training workshops on PC software, courses on Coltech or attendance at provincial education seminars. At many colleges, even these minimalist activities have come to an end as budgets are tightened and staff development opportunities reduced.

Much of the blame for this state of affairs can be placed at the door of the KZN and national Departments of Education. Academic staff and management maintain:

- Severe demotivation has set in since the delinking of salary increases from the acquisition of higher qualifications. The average qualification level of college staff is at the M + 4 level. There are now no new incentives in place for staff to improve their qualifications.

- There are no provincial or national career paths for college educators. Merit payments and notch increases have been shelved.
- The moratorium on filling vacant posts and creating new posts, and the preponderance of temporary posts and 'acting' appointments in many colleges has had the effect of dampening enthusiasm to rise up the occupational ladder.
- The technical college community speak of a 'policy void' associated with the shift away from the old order, which has led to certain staff development systems and procedures being annulled. No new policies have been put in their place.
- The exceptionally poor salary levels especially in key technical fields make it very difficult to recruit top-class teachers and trainers. The continuation of the policy to link college educator conditions of service to those of school teachers (whereby salary levels are determined in relation to the possession of teaching diplomas and negotiated in the Education Labour Relations Council) has had the effect of hampering colleges' ability to attract quality technical staff.
- The exceptional slowness of the Department of Education in paying new staff members their salaries is a demotivating factor.

This scenario has had devastating effects on lecturer morale. Notwithstanding the earlier comments about committed and professional staff, many lecturers now feel despondent and demotivated about working in the technical college sector. Ironically, even senior management staff have complained about the lack of departmental support for their leadership via management training programmes. One senior college manager complained:

> There are currently no support or capacity-building initiatives at the college. There is nonetheless a great need for the

development of senior management who were promised training when they were appointed into senior positions, but who so far have received no guidance. As a result they feel insecure in their current positions.

All in all, there is great cause for concern regarding the lack of staff development in many technical colleges. Restructuring strategies in the province will have to prioritise and address these problems.

6.4.2 Quality assurance

A related problem is the total absence of quality assurance mechanisms in the technical colleges. Yet again, much of the blame can be laid at the door of the KZN Department of Education. The 'policy void' referred to earlier has impacted here too as previous departmental activities such as in-service training courses, refresher courses and departmental moderation via inspectorates have all fallen away with no new systems taking their place. Consequently, no formal mechanisms for quality assurance currently exist.

However, there are a number of informal quality assurance mechanisms in some of the colleges. There are proxy indicators of quality, for example, examination results. In fact, frequent reference was made to good examination results as the main indicator of quality. All the colleges claimed to have examination results above the national average, signifying (in their eyes) evidence of good quality provisioning.

These proxy indicators are complemented in some colleges by moderation procedures undertaken by Industry Training Boards for courses accredited by these boards. However, the most widespread informal quality assurance practice are the class visits organised between colleagues in the form of peer reviews, the spot visits by senior management, and the staff networking that takes place between neighbouring colleges in some localities to improve

teaching practice. These practices, although welcome, are neither widespread nor are they systematically organised. They are not substitutes for a formal system of quality assurance.

Some staff were opposed to the idea of quality assurance, and some students contradicted information given to the research teams by management on quality assurance. In one college it was noted:

> The staff defend their freedom to take responsibility as follows: 'Results speak for themselves and if we do not perform, students will confront us.' They argue that re-introducing classroom inspection and monitoring of preparation files will undermine their professional integrity.

Students are critical about the lack of formal quality assurance. In some institutions they refuted alleged course monitoring and assessment exercises. They said this was not happening or only happened because students complained about the course. Students also claimed they were not given the opportunity to evaluate courses and the lecturers' teaching methodologies. Indeed, we found no evidence of such evaluation opportunities. The danger in not institutionalising quality assurance is that conflicting claims can then be made by different stakeholders – management, staff and students – about the quality of courses without any recourse to a more objective measure. These highly subjective and conflicting claims in the long run can only damage the image of the institution in the public eye. Formal quality assurance mechanisms are an urgent requirement in the technical college sector today.

6.4.3 Involvement with curriculum reform and the NQF

A third cause for concern in the staff development environment is the lack of curriculum development at the colleges. Lecturing staff

are ill informed about new policy developments such as the NQF, outcomes-based education, SAQA and unit standards methodology. One college observation revealed:

> The college has never had a workshop or seminar on the NQF and OBE and some staff members do not seem to have a clue as to what these acronyms stand for let alone mean.

There is a widespread passivity concerning the new curriculum policy environment: Colleges are awaiting instructions from the department before taking the initiative on curriculum reform and the NQF. Their lack of involvement is cause for concern given that much of the NQF's impact depends on the way in which the FET sector articulates with the world of work and higher education and training. This ignorance of key issues on the part of college lecturers is a serious indictment of institutional readiness to embark upon substantive change without the necessary support, understanding and capacity to carry it through.

College lecturers speak of a 'catch-22' dilemma with regard to curriculum reform. The technology in most college workshops is outdated – few colleges have kept up with the transition to the computer-aided manufacturing (CAM) and design (CAD) environments that are prominent in the modern enterprise today. There has been no real compulsion to change curricula because equipment in the workshops has remained the same. In the bureaucratic mindset curricula should therefore remain unaltered. Indeed, some 'N' course curricula have not changed for 10 to 15 years. The catch-22 dilemma is that many of these old curricula cannot be changed without major changes in the technological infrastructure of the workshops, which the state cannot afford at present. To complicate matters further, the production of the college curriculum is a national competency that college lecturers are not involved in. There is very little room for institutional innovation and curriculum

customisation. The prevailing passivity evident in many colleges is a by-product of this dilemma – lecturers have no way of reforming curricula that are firmly controlled by the central Department of Education. They have therefore shown little interest in new concepts such as unit standards, outcomes-based education and the NQF.

One exception to this dismal array of problems is the fact that many of the workshop/practical training lecturers are active in the shift to outcomes-based education and the formulation of unit standards. Whilst the theory ('N') courses are designed by the national Department of Education (and are currently delinked from the NQF), the practical components are being accredited by Industry Training Boards who require their courses to be structured in modular formats with unit standards written upfront. The Department of Labour in terms of its recently released *Skills Development Strategy* is also driving these requirements. It is ironic that the Department of Labour is more active on this educational front than the Department of Education. The inertia evident in the national and KZN Departments of Education and among college lecturers with regard to curriculum innovation could to lead to an institution-wide paralysis unless steps are taken to begin reshaping the curriculum and modernising the workshop technology in preparation for the 21st century.

6.4.4 Absence of an affirmative action plan

Chapter Five dealt with the issue of the racial composition of academic staff. It was reported that whites comprise 46% of academic staff whereas 80% of students are now black. What is significant about these figures is the rapid pace of Africanisation in student enrolment in institutions previously categorised for other race groups. In a shift that occurred largely over the past five years,

African students now account for about 80% of enrolments in most institutions. Interestingly, academic staff composition remains very much as it was five years ago, with a predominance of white academic staff in ex-HoA and ex-DET institutions, coloured and Indian academic staff dominating in ex-HoR and ex-HoD colleges. African staff are in the majority only in ex-homeland institutions and in some of the ex-DET colleges. In addition, in those institutions with a preponderance of white staff, black staff tend to acquiesce to a subordinate and silent role in college management. This overall situation has serious repercussions for staff-student relations – a point that will be further analysed later.

It is clear that there is no formal staff equity or affirmative action policy at any of these colleges, nor is the department driving any such equity plan. Many of the colleges with a predominance of white staff have a very defensive stance on the matter of employing new black colleagues:

> No formal policies are in place in this college but the management team was fully aware of the Employment Equity Act and its implications for the college. They mentioned two major reasons why it was difficult to implement these policies. Firstly, the salary structures are too low to compete for employees. The non-recognition of technical experience for salary purposes is especially damaging in this regard. Secondly, It is easy to say that capacity building and affirmative action should be adhered to but management also has a responsibility to students to ensure that they get the best teaching possible. Because of the past political dispensation not many applicants from the previously disadvantaged groups are competitive as yet.

The refrain heard in most institutions was that 'the most suitable person with regard to experience and qualifications, regardless of

race, will be appointed by the college council'. This intransigence towards affirmative action, coupled with a rapidly changing student composition and, in some cases, unchanged council composition, is a formula for disaster. Social tensions between students and staff are likely to erupt in the future with devastating consequences for a totally unprepared executive management.

The situation with regard to gender relations remains unchanged. The traditional gendered divide between technical and commercial trades still prevails, and so the majority of female academic staff are located in commercial/secretarial departments, whilst men dominate the technical teaching and most senior managerial positions. Interestingly, there is growth in the number of female students enrolling for technical subjects – in some cases as large as 20% of the total enrolment.

6.5 LEARNERS

6.5.1 Apolitical SRCs

A remarkable feature of the technical college sector in Kwazulu-Natal is the absence of a tradition of political conflict – and in some cases this stretches back as far as 20 to 30 years. This is even more remarkable given the political conflict that has raged in the region since the early 1980s between Inkatha and the UDF, in the 1990s between the ANC, alleged third force elements and Inkatha, and more recently, between the ANC and the UDM. Colleges have remained intact and undamaged by this long history of conflict. This would appear to be a major asset for the region. However, on closer examination, the potential for conflict is very real.

There are SRCs at most of these colleges and they are all extremely apolitical. Our observations at one college are typical of the others as well:

> An interesting feature of the student body is that they are regarded as 'apolitical': They refuse membership of national student organisations because these bodies do not act in their interests. One provincial meeting was attended by the chair of the SRC who felt that the meeting was too 'political' and not sufficiently 'academic' in orientation. The students further believe that only a few will benefit through participation in national and provincial meetings. The money saved through not paying membership fees, travel and accommodation costs can be used for the benefit of all by, for example, holding social functions. The management of the college shares this belief.

Most of the KZN college SRCs are not affiliated to the South African College Students Association (SACSA). Management has played a strong role in encouraging non-affiliation, as our observations at many of the colleges indicated:

> The SRC is not represented on SACSA. Membership seems to be rejected in KwaZulu-Natal as the students want to concentrate on their studies. This decision was taken by the SRC after the principal informed them about the potential negative consequences of affiliating with such an association.

In another college interview, the principal stated that he did not see the need for the SRC to affiliate with national student bodies whose objectives were seen as political. This view was supported by interviews with officials in the Department of Education and with the SRCs themselves.

The main functions of the SRCs, as set out in many of their constitutions, are to

- assist the principal and staff in their understanding of student problems and to promote communication between students and the college authorities;

- encourage and co-ordinate all social, sporting and cultural activities beneficial to the students as well as the college as a whole;
- create a feeling of unity among the students, a general enthusiasm and spirit of co-operation concerning college/student affairs and to enrich the social and cultural development of each student.

In some cases, SRC members also sat on college councils and academic boards. However, although apolitical, student perceptions of their roles were nonetheless suspicious and sceptical. They believed that their main function was to police the campus on behalf of management – 'to keep their eyes and ears to the ground, and to report any problems to management before they exploded'. The SRC's primary formal task appeared to be to organise social functions for students – and this role too was limited by a number of factors constraining campus social life which will be discussed later.

The apolitical and ineffectual character of these SRCs can be ascribed to a number of reasons. A central determining factor is the structure of the academic year and the difficulties it causes for effective representation. Most SRCs usually consist of class representatives from each trimester, semester and year-long course. This structure makes for a transitory and unstable SRC because most of the engineering representatives for example are busy with trimester courses and therefore sit on the SRC for less than three months, whereas class representatives from the commercial stream sit on the SRC for a semester or a year (secretarial courses run for a full year). In addition, many of the colleges do not provide natural neighbourhood communities for student cultural and social life. The student body in most cases is predominantly African, whereas the college is often located in a residential/industrial area historically

segregated and far from African townships. The students do not have a sense of neighbourhood in which to fulfil their social life as is, for example, the case in most university towns. Other contributing factors underpinning apolitical and asocial campus life are, firstly, the fact that there are few hostels attached to colleges and, secondly, that theory classes finish by 14:30. The campus is relatively empty after this time. As a consequence of all these factors, there is little incentive or desire on the part of the SRC to engage politically or to organise socially. Many senior managements state that they ensure that the students work hard thereby avoiding political trouble on campus.

Not surprisingly, the only institution where there was an active and politicised SRC was at the one college that has experienced severe institutional turmoil and leadership conflict over the past three years. In the midst of feuding staff and management was a highly politicised and informed student body with the capacity to destabilise the educational process. In their case, we observed:

> The SRC students are knowledgeable about national policy developments and their implications for the college and FET sector. This is partly due to their high level of politicisation, their involvement in the affairs of the college and their membership of SACSA.

The state of student politics in the college sector in KwaZulu-Natal is double edged. It simultaneously provides institutional management and government with a golden asset and a difficult challenge. On the one hand, the sector has escaped the ravages of student militancy over the past 20 years, and most of the institutions have benefited from this. The infrastructure is in good repair, undamaged by the violent student uprisings that have occurred elsewhere. On the other hand, it is evident that this peaceful state of affairs is due to an undiscerning student population and an autocratic leadership

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that is still predominantly white. Campus tensions could erupt easily particularly with regard to the tense race relations that lurk beneath the surface between staff and students.

6.5.2 Student social life on campus

Perhaps the major social burden for students is a consequence of apartheid's poor urban planning. Many of the former ex-HoA, HoR and HoD colleges are located in areas far from the African townships, causing serious transport and other problems, as is highlighted in the observations at two colleges:

Institution One

The students have transport problems as the college is situated on the edge of the town. There is no public transport service and the students have to make use of a private bus service and taxis. During holidays the private bus service does not operate, resulting in serious transport problems for students.

Institution Two

This institution serves an African student population that is generally not part of the surrounding community, which is Indian. Because the college is located outside town it is not easily accessible to the African students who mainly come from distant areas. Transport is costly for them as they have to make use of two taxi shuttles.

Other problems ensue from this distant location. As mentioned earlier, social activity is ruled out because of the absence of a familiar neighbouring community. Crime is also often high in the vicinity of the colleges, particularly at night. This makes access for further study during the evening and weekends difficult, limiting the full utilisation of facilities.

However, the major constraints on student social life appear to emanate from within the campus itself. Social life on campus is non-existent. Many campuses do not have tuckshops, canteens or sporting facilities. Those institutions that had a good sporting infrastructure in the apartheid era appear to be no longer using it advantageously. The following observations in this regard were made at three institutions:

Institution One

Student facilities at the college include a rugby field, volleyball court, tennis court and cricket nets. The facilities looked abandoned as a result of minimal use.

Institution Two

Recreational facilities include an abandoned swimming pool, table tennis facility, soccer field and netball court. None of these facilities seem to be fully utilised.

Institution Three

A fully equipped rugby field with locker room and entertainment facilities is used extensively by the neighbouring, largely white community. There is very little evidence that the black students use these facilities or that their wish for a similarly equipped football ground will be met.

It appears as if possibilities for enhancing campus life through sporting activities are being lost due to good sporting infrastructure being abandoned, underutilised, or hired out to neighbouring white communities. Black students do not appear to be benefiting from the social infrastructure historically acquired at these colleges.

The repressed social life of students in technical colleges is a negative factor that combined with other problems could lead to protest in the future. These grievances need to be acted upon soon.

6.5.3 Rigid disciplinary code

In many of the interviews, the students described what can only be defined as a 'late-Victorian' moral code that impinges on their rights during class time. Most students are in the 18-25 age bracket and are therefore adult, with those in the 25-30 age cohort married with kids. However, many highly prescriptive and rigid rules restrict their adult freedoms at college. For example, they complain that in some colleges they have to eat outside, even in bad weather, because of the belief that they might litter the classrooms; SRC inputs are neglected, students are not allowed full meetings of the student body nor use of the hall; students have no sick room in some colleges; they have to pay inflated prices for textbooks; they are not allowed to use college vehicles for student-related activities (management claims that this would be against government regulations); female students are not permitted to wear jeans; men and women are separated by differing break times for commercial and technical subjects; and in general, students have the perception that doing N1-N3 is really like repeating matric and an insult to their intelligence. All in all, student views of college life are that it is regressive, and in some ways worse than high school life.

In most colleges there is a strict attendance register, which accounts for the high attendance rates and good pass rates. But the disciplinary code appears to extend beyond the requirements of good learning for adult students. For example, the dress and moral code is rigid in most colleges, restricting dress styles in some colleges:

- Shirts without sleeves are unacceptable.
- Bangles of any description and slops are not allowed.
- Hair should always be clean and well groomed.
- Tight-fitting clothes are prohibited and blouses have to be properly buttoned.

In one college it was reported that learners who did not adhere to the strict dress code were usually embarrassed in front of the others by the principal. If these codes were applied at universities in respect of the same age cohort of students, the universities would come to a standstill because almost all the students would contravene one or other of the codes and face disciplinary hearings. Thus the disciplinary codes in colleges seem to reflect a punitive element that has little to do with quality learning and a lot to do with a moral code inappropriate for adult learners.

The cumulative effect of these social factors on student life is damaging. It appears to contribute to a latent potentially destructive tension and distrust between staff and students. Students describe the situation as racial, but when looked at more closely, it appears to arise more out of the social restrictions described above and a lack of real communication than anything else. Particular white individuals in senior management in many colleges appear to fuel these perceptions of racism by their style of leadership – traditionalist, authoritarian and paternalistic. Modern methods of participative management, progressive pedagogy (encouraging adult relations between students and staff) and good campus management with the emphasis on a healthy social life appear not to have filtered through to many of these institutions.

6.6 QUALITY OF STUDENT LEARNING

6.6.1 Career counselling

Little formalised career counselling is offered in the colleges visited, except *ad hoc* advice during registration. Most students appear to have little idea of what courses they want to enrol for and what occupations interest them. We made the following observations at

two institutions visited, the first an ex-HoR college and the second an ex-DET institution:

Institution One

Few students come to the college with any work experience, as most are school leavers and matriculants. The college uses its prospectus to orientate students on a subject basis before registration. On application, students are scanned and given points based on the results from their previous institutions. Staff then explain the available courses and provide advice on the most appropriate courses. The final decision on which courses to enrol for nonetheless still rests with the student. Most students come to the college with no idea as to which courses to enrol for. Applicants are turned away only 'when the college is full'.

Institution Two

The students said they did an aptitude test, but received very little orientation thereafter. They were not given a college prospectus. It was obvious that they had little understanding of the N1-N3 course and the labour market value (added-value after matric) of such a study path. They were not aware that they faced unemployment after college and that only 15% of their peers were likely to get jobs. They appeared to have a naive perception that they would easily find a job. This naivete has a lot to do with poor counselling and minimal career guidance inside and outside the college.

These observations highlight a number of problems. Enrolment is nakedly supply-driven, i.e. colleges offer whatever courses lecturers can teach irrespective of whether there is 'market demand' for such skills and whether students graduating from these courses have any employment prospects. It appears as if no labour market information

is available to college staff (through tracer studies and other labour market tools). As a consequence, little employment information is passed on to students. They enrol therefore in large numbers in fields that provide few employment prospects. The shift to commercial and secretarial courses at N4-N6 levels, the shift away from technical fields of study and the absence of SMME-type course provision are further manifestations of this problem. Decisions on course provision should be a balance between

- a central state-led 'national human resources development plan' that identifies the priority fields of study at the FET level;
- measurable market demand in the local and regional economies for such skills;
- college expertise in teaching certain occupational fields;
- students' personalised choices.

Primary reliance on the third factor is a fundamental weakness in the system. This appears to be the situation today.

Some colleges attempt to provide a more visible career counselling service. The strategies employed include the regular production of an updated prospectus, the holding of career days for prospective students, and school visits that tend to take place in the spring months prior to formal college registration. However, few of these institutions have trained counsellors who provide counselling services throughout the year. None of the colleges have public relations, marketing or placement officers whose job it would be to search for opportunities for work experience and future employment. In short, colleges currently do not have the resources to meet these needs.

A second problem highlighted by the observations quoted above is that students appear to be blissfully unaware of the career crisis they face. They are by and large an undiscerning community desperate to add anything to their poor matriculation qualifications with almost

no knowledge of the college sector or their future job prospects. It could be argued that these students are being short-changed by the state system of education. Their matric has little street value and their N1-N3 (obtained often without practical training) adds no additional value.

6.6.2 Academic support and the learning environment

Staff development is an integral component of any programme aimed at supporting student learning. As was noted earlier in the section on staff development, college managements do not see the need for staff development and have a conservative view of teaching. This approach is manifest in the following observations typical of many of the colleges:

> Very little formal support is available for staff development. Support for teachers took place mainly on an informal level. Although it was acknowledged that employees needed to develop and grow, this was not seen as the primary task of the college. The college took the view that students were clients and deserved the best teaching that meant that it would be inappropriate to appoint somebody who still needed to be developed before they could deliver the goods.

The idea that lecturers can become expert teachers and never need honing of their pedagogic skills is dangerous given the scale of learning difficulties currently being experienced in ET institutions in South Africa today. Colleges appear to be the only institutions not to have been affected by the 'academic development' and 'student support' movements that are now playing a critical role at tertiary institutions. College managements view the deficits students bring to the college as a burden and not as a challenge. A common perception is that

> ... the standard of teaching and training has dropped. This is ascribed mainly to the medium of instruction (English) which is not the mother tongue of the majority of learners or lecturers. Because of this and other learner difficulties, it was felt that lecturers were 'teaching' and not 'lecturing' as supposedly should occur in a tertiary institution (which they perceived the college to be).

In other words, for many college managers and lecturers, the problem of student learning difficulties is a handicap because it diminishes their main function as educators and their social status in the educational hierarchy – instead of being equivalent to university lecturers they are equivalent to secondary school teachers.

There is currently no formal programme of academic development for students in the province. Neither the Department of Education nor college managements have any formal plans. There is merely a range of informal courses and *ad hoc* experiments to assist students with their learning difficulties. In one ex-DET college a programme known as 'headway' has been implemented and entails one and a half hours of language skills development a day. Many of the colleges are offering the NCOR (National Certificate of Orientation) course which is used to prepare students for entry into N1 courses and which orients students towards a post-school institution. However some colleges were critical of these Department of Education – approved courses:

> A NCOR bridging course was once offered at the college (ex-DET) but later cancelled. The course, a national technical college orientation programme, which is still being offered by other technical colleges who find it useful, was cancelled at this college because the management claimed it was not

bridging and merely demotivated students who wanted to move straight into N1 courses.

This college and its students may be correct in their assessment of the course, but many other colleges use it because it is the only programme available to them.

Students face numerous problems. The biggest is the language issue and poor comprehension particularly in the medium of English – which is the second language of most of the Zulu-speaking students in the province. Students also lack proficiency in basic maths and science. Lecturers maintain they spend more time explaining basic concepts and terminology to students than making substantive progress with the curriculum subject matter. The difficult social relations in these college environments also complicate student learning, which was alluded to earlier. Most students are young adults whose experience of the college environment is limited. Latent racial tension also impinges negatively on the two-way relations of trust and respect that are central prerequisites for successful learning environments. It is disturbing that the academic development 'problem' in FET is not based on students' inability to move up to higher levels of tertiary learning after matric, but rather on their inability to move back into pre-matric levels of post-compulsory learning. Many students with a Grade 12 from formal schooling are considered not ready to enter a Grade 9 equivalent programme in technical colleges and, as a consequence, are required to do a bridging course before they can proceed with the N1-N3 programmes (which are in any event equivalent in the learning hierarchy to Grades 9-12). In short, there is no value added for most learners today but rather a value reduction in the transition from school to college. This regressive learning pattern should be treated with the greatest sense of urgency by policy planners in the province and in the central Department of Education.

6.6.3 Absence of practical experience

The main thrust of vocational education and training (VET) is that it prepares students directly for work. A critical assumption underpinning VET institutions such as technical colleges is that they, unlike formal senior secondary schooling, will provide students with practical training and some work experience in various occupational fields. This practical training, alongside the more formal classroom theoretical education, will prepare them adequately for employment in the wider economy.

It was disturbing to discover that this fundamental premise is not being met by the vast majority of technical colleges in KwaZulu-Natal. There are many reasons for this failure, the most fundamental being the phenomenon of jobless growth and diminishing employment opportunities. However, two additional reasons can be identified. Firstly, the historical failure by the Department of Education to equip technical colleges with adequate up-to-date workshops, particularly in the engineering fields, and, secondly, the failure of employers to form meaningful partnerships with colleges that would include assistance in the provision of workshops, practical training and work experience, are major contributing factors in the low placement rates.

Table 6.6.3 shows that many of the KZN colleges visited do not satisfy the requirements for an effective VET institution in that they do not have adequate technical workshops on their premises.

The figures in Table 6.6.3 are alarming. Only three colleges of the 13 institutions visited can be said to have good workshops that are being put to proper use. Another institution trapped in a three-year cycle of interstaff conflict and student disruptions has excellent workshop facilities that lie idle because of the long-standing conflict.[1] A further five colleges have no facilities, and five others

have inadequate workshops, many of them really small demonstration laboratories with old equipment that cannot be used for effective practical training. This scenario has a devastating effect in the labour market where employer views of college graduates are at an all-time low:

> The quality of the output at this college is questionable. Without the necessary learning materials, it is near impossible to imagine exceptional students from the college. One of the industry representatives alluded to this problem, saying industry is not always happy with the quality of the students they get from this (and other) college(s). What makes matters worse is that most of the students graduate without any form of practical experience. The theoretical knowledge of the students is not of exceptional quality just average, and this can be attributed to the fact that without practicals, theoretical training is never adequate and complete.

Table 6.6.3: Existence and quality of workshops

College	Has good workshop facilities	Workshops are inadequate		No workshops
		Has inadequate workshops	Has demonstration laboratories only	
A	X			
B				X
C				X
D	X			
E				X
F			X	

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G			X (also has a welding workshop that is not used)	
H				X
I		X		
J	X			
K		X		
L	X (4 new workshops but not used)			
M				X
TOTAL	3 PLUS 1	2	2	5

It should be noted, however, that those institutions with adequate workshop facilities appear to have dedicated staff members who are innovative in their efforts to give students meaningful practical training and work experience. But, on closer examination, these workshops are also not entirely satisfactory. These institutions are caught in the catch-22 situation mentioned earlier. National curricula have been determined centrally and some have not changed for many years. They outline the syllabi for the practical workshops. However, these syllabi are based on what has become antiquated equipment in most of the workshops. Because there are no funds for new equipment, curricula must remain unchanged so as to encompass the actual equipment in use. The problems of those workshops identified as adequate are exacerbated by the salary and conditions of employment norms imposed by the national Department of Education, which peg salaries to teaching diploma qualifications which are too low to attract the best technical people from industry.

Some college staff faced with inadequate workshop facilities are doing admirable jobs despite their constrained circumstances. In one ex-DET institution we made the following observations:

> The college seems to be making do with the little they have. What is impressive about the college is that all the workshops are fully utilised, even though some of the equipment is old. The practical component at this college is very strong and by far the best of those colleges we visited in this region.

The poor practical training received at many technical colleges is matched by the absence of job opportunities outside the colleges. Practical training and brief periods of real experience in the workplace should be complementary processes but in the KZN study this was not the case. Almost 90% of the students are African private full-time students with no employer sponsor. This is a dramatic shift from the old apprenticeship model based on 100 percent part-time trainees who were sponsored by employers to study at college for short periods of time, thereafter returning to work at the sponsoring enterprise. Most of today's technical college students, especially in the engineering fields, are failing to gain workshop training and work experience. It comes as no surprise, then, that they fail to obtain employment after graduating from college.

Having said this, there have been some successes in placing college students in external programmes to gain work experience, especially in the informal economy and in fields such as educare, haircare, food services and, sometimes, in business studies. Dynamic projects are under way to place students in these fields in township spaza shops and hair salons. Food services students are providing catering to outside clients. All these students are interns who will shadow more experienced employees who are already practising their trade in the wider economy. These efforts need to be amplified.

Other colleges are making adjustments to cater for the low chances of external work experience by simulating work activities internally. Some institutions, for example those involved with building and

construction training, invite the students to assist in building vitally needed infrastructure at the colleges, thereby saving on costs and utilising internal capabilities. This was earlier referred to as a 'self-help' ethic that has great possibilities for expansion beyond the college to include work in the local government and community domain, for example assisting in the construction of community centres and other infrastructure. What is needed, though, is a paradigm shift away from the old apprenticeship model (where access to work experience was a given) and the defeatism of many students when faced by the current low levels of employment. Creativity and initiative are now needed to explore these kinds of self-help activities beyond the confines of the college itself.

There is strong evidence to suggest that the apprenticeship system is all but dead. Some colleges report a 50-60% collapse over the past five years. The only consistent factor relating to apprenticeship has been the presence of parastatals such as Iscor, which have historically always supported apprenticeship training. They still do, but on a much smaller scale. Private sector-sponsored training does occur, but it appears to take place only in locales close to the industrial heartlands of the country's economy and usually via the ex-HoA (white) colleges. In most cases, private companies neither sponsor large numbers of students, nor do they employ large numbers of graduated college students.

A critical observation, then, that needs to be made is to note the positive role of the state (parastatals such as Iscor) in providing practical training and work experience – in the past and still today – which should not be lost. The role of the state should continue, but its form should change – away from apprenticeship towards a much broader spectrum of training aimed particularly at the informal economy and self-employment. This point will be raised again later.

6.6.4 Poor placements

Some of the ex-HoA colleges (formerly white institutions) have maintained reasonably good placement rates – putting graduated students into jobs – particularly at the senior course levels N4-N6. Observations at an ex-HoA college in one of the industrial heartlands of KZN revealed the following:

> Most of the students are employed locally and employers expressed their satisfaction with the quality as well as the professionalism of the students. The feeling was that all N6 students get a job within five weeks after completing their courses and that teacher support is a major factor in achieving this. Placement is made much easier as various employers come to the campus to assess the students for recruitment. These include Iscor, Eskom, Telkom, Sappi, Readymix and Portland Cement.

Many students are attending the above college with the support of Iscor loans and therefore have a good chance of being placed with Iscor. The college, because of its location, has also been successful in enrolling quite a few apprentices who are already employed in the area.

Another ex-HoA college has introduced an innovative scheme to assist graduated students' entry into the labour market. The college runs a job placement service under the auspices of the deputy principal at a fee of R200. The service includes assistance with CVs, completing forms and preparing for interviews.

However, in both the above cases, no formal tracer studies were conducted to measure the extent of placement and the degree of employer and client satisfaction with the training received. These

colleges rely on informal feedback from former students and neighbouring employers.

The picture is rather bleak when considering all the colleges together. Most indicate that the majority of their students (90%) are privately enrolled with no employer sponsorship. The phenomenon of jobless growth South Africa is currently experiencing has resulted in few new job opportunities for college graduates. Consequently there is a very low placement rate, probably in the region of 15 percent for the college sector as a whole.

Most colleges do not have formal placement programmes, nor do they undertake any monitoring activity or tracer studies. They rely solely on informal contacts with firms and anecdotal information for feedback on successful placements and client/employer satisfaction with the training. A consequence of the institutional inertia is a severe malfunctioning of the labour market with no assistance being given to graduating students to find employment and make their training meaningful to their career and personal development.

6.6.5 *Pass rates*

An interesting feature of the qualitative visits to 50% of the KZN technical colleges is the boast by many colleges that they achieved pass rates significantly higher than the national average – which of course begs the question: Who then is attaining pass rates below the national average? In general, however, pass rates appear to be between 60-70% across all subject fields in the colleges visited, whereas the national average ranges from 40 to 58%. Marks vary widely across subject fields with very high results in educare and commercial subjects (in the 80s and 90s) and with significantly lower results in the engineering fields (in the 60s). One ex-HoA boasted the following high pass rates:

Table 6.6.5: Pass rates at one technical college in KwaZulu-Natal

Year	Secondary level course pass rates	Tertiary level course pass rates
1995	96%	85%
1996	95%	89%
1997	99%	87%

In sharp contrast to the above outcomes, some of the ex-homeland, ex-DET, HoR and HoD colleges (although by no means all of them) attained results far below the national average. For example, one ex-homeland college that has been caught up in internal difficulties for over three years attained an average pass rate of only 45 percent.

6.7 KZN DEPARTMENT OF EDUCATION: A POLICY 'VOID'

Mention has already been made about the 'policy void' in government administration of education since the transition to a democratic dispensation in South Africa. Although remarkable change has occurred with the amalgamation of five formerly separate apartheid education administrations into a single provincial department, serious deficiencies have resulted from this merger process and from the broader political transition that has taken place across South Africa. This void has three primary manifestations:

- It concerns the total *absence of any staff and student development programmes* in the province. The provincial department plays no role as a catalyst for change in the fields of staff development, affirmative action, curriculum renewal and student academic support services.

- It has also concerns the *cancellation or abandonment of components of college management which were in place in the old dispensation but which have not been replaced with any new systems.* These include the endless moratoriums on permanent staff appointments and the creation of new posts, the absence of quality assurance mechanisms, the absence of a visible HRD policy with mechanisms for merit awards and promotions, the absence of curriculum/subject committees in the province, and the collapse of health and safety training courses and practices.
- *An inept bureaucracy*: The KZN Department of Education has shifted its administration headquarters from Pietermaritzburg to Ulundi with severe consequences for the region. There is a negative perception of the competence of the department among lecturing staff, college management and council members. Some of the grievances include regular delays in the payment of salaries of up to six months, poor communication channels and the loss of college correspondence, college requests not being followed up, and limited personpower in the departmental division that administers technical colleges.

The negative impact of this 'void' is greatest in terms of staff morale. Observations at one college revealed the following:

> There is much frustration and staff morale is low. Several factors aggravate this state of affairs. The principal has been acting for many years and the deputy principal had also acted before he left. Moreover, the college council has been in place only for one month and only 16 of the 29 teaching staff members are permanent, and of these four are in acting positions. To make matters worse, staff members who were promoted in April 1998 had not received their salary increment at the time of the researchers' visit [July 1998] and many temporary staff members often wait two to six

months before their salaries are paid. It is clear that the inefficiency of the provincial Department of Education exacerbates rather than improves the poor state of affairs in KZN education.

Endnote

1 This institution has just acquired new management which hopefully will move rapidly to rectify this wastage.

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Chapter 7

AUTONOMY AND RESPONSIVENESS: EVIDENCE FROM THE QUALITATIVE CASE STUDIES

Andre Kraak

7.1 INTRODUCTION

Devolution of power and greater institutional responsiveness towards community and industry needs are two key pillars of the new FET policy environment. This chapter investigates the degree to which these institutions are ready to meet the new challenges.

7.2 PATHWAYS TO AUTONOMY

The subject of college autonomy triggered lively discussions in our site visits. The colleges differed widely on the degree to which they supported the principle of greater autonomy for technical colleges, and stakeholders held distinct views on the subject. Table 7.2 below attempts to categorise all the institutions in terms of our view of their readiness for autonomy. Several criteria were used (mostly

qualitative and observational) to guide our assessment of their position in the tabulation. These included interviewee comments on the topic of autonomy; the observed effectiveness of management in terms of information systems (Coltech), strategic and financial planning, and the quality of IT infrastructure in the college; academic results, staff commitment, creativity and morale; and, lastly, student confidence in the institution. The results are interesting although disturbing:

Table 7.2: Index of college readiness for autonomy

College	Ready for autonomy soon	Autonomy possible	Autonomy not an option in the short term
	With a small amount of capacity building	With a significant programme of capacity building	These are weak institutions highly dependent on the state; they will need a major programme of capacity building over a long period of time
A	X		
B		X	
C	X		
D	X		
E		X	
F			X
G			X
H		X	
I			X
J	X		
K			X
L			X
M			X
TOTAL	4	3	6

7.2.1 Awareness of new policy issues and new governance arrangements

The starting point for discussion on the issue of increased autonomy for colleges was the extent to which managements, staff, students and councils were familiar with the new policy environments in FET, and in education and training in general. The importance of this familiarity indicator is significant as the promise of autonomy is contained in the policy framework for FET alongside other fairly stringent requirements for colleges. The new policy environments require colleges to be able to administer programmatic funding and design three-year planning frameworks. Colleges will need to be able to define new curriculum 'niche' areas, initiate mergers and regional rationalisation where necessary, and take cognisance of new industry training levies. They will also need to be familiar with the new HET regulations that impact on technical colleges, the NQF and new governance structures such as SAQA. If colleges were conversant with all these issues, it suggested some ability to think, plan and function independently of the state in driving their own destiny.

The results of our research point to a low awareness of policy issues except on the part of a small group of senior management and the principals themselves. Those who had knowledge of the key policy documents were often suspicious of the intent, for example believing that the new FET policy environment would force colleges to compete with HET for funding N4-N6 type courses but would treat them as school teachers in terms of salary norms. This 'in-between' institutional identity which viewed colleges as marginalised and squashed-in by the dominating GET and HET bands was persistent throughout the site visits.

7.2.2 Institutions ready for autonomy

Table 7.2 suggests that there are four institutions (three ex-HoA colleges and, surprisingly, one ex-DET institution) which are almost in all respects ready to attain autonomous status in the near future. They ooze confidence about their ability to manage the key functions of an autonomous FET institution. The following observation from an ex-HoA college is typical of this confidence:

> It was felt that the college was already functioning as an autonomous institution with only a few exceptions. The government is supplying funding only for salaries (not all salaries) and the feeling was that this funding should confine but that the council should decide on how it is used in the end. An interesting idea was that the government should first ensure that councils have the necessary skills and then transfer the responsibility for running the colleges to them. A major problem is the non-accreditation of technical experience, which means that good lecturers, especially for the engineering subjects, are hard and sometimes impossible to find. The council needs the power to appoint and dismiss staff and to decide on salary levels for specific posts.

Councils and management were the most vocal on their need for independent authority to appoint competent staff, particularly technical staff, on competitive terms so that colleges could draw on available expertise from industry. At present, technical staff are treated as part of the college-school (CS) teaching core in terms of the norms and regulations of the national Department of Education and by the Education Labour Relations Council, which denies college managements and councils the right to hire technical expertise from industry at market-related salaries. Strong autonomy would resolve this major problem.[1]

Autonomy was also supported by these four institutions because they wished to be freed from the bureaucratic slowness and inefficiencies of the Department of Education in approving and processing applications, requests and new salaries. They also sought freedom from the long moratoria declared on posts and permanent appointments which have created high levels of job insecurity among lecturing and management staff. In one college, the council's strongest argument for autonomy was

> ... their deep sense of frustration with the rigidities and bureaucratic slowness (and sometimes incompetence) displayed by the Department of Education.

7.2.3 Partial autonomy requested

Many college staff members advocate partial autonomy because they are not in favour of total independence from the state. They believe the state should continue to pay the salaries of the core college staff. What they are seeking is partial autonomy where state norms and standards will continue to shape national curricula:

> The stakeholders in this college feel that the core curriculum should be standardised on a national level by experts to ensure national certification. Lecturers, however, should be allowed flexibility to add to the core curriculum and even create their own textbooks when prescribed texts are not available. This is mainly the case with regard to practical subjects.

Stakeholders held contradictory views on autonomy regarding salary issues. On the one hand, as reported above, managements and councils wanted the power to attract expert staff at market-related salaries; on the other hand many staff members believed that salary levels should continue to be regulated by national norms so as not to exacerbate the current inequalities between institutions.

7.2.4 Institutions in need of limited forms of capacity building

Table 7.2 also highlights a second category of institutions – three of the colleges visited – which were not confident about their abilities to govern autonomously. These colleges will require a limited period of capacity building and training to assist them along the pathway to autonomy. Of the three colleges interviewed, all indicated the need for greater administration, financial management, MIS and strategic planning capacities and new personnel to administer these increased responsibilities. The management in these institutions recognised their inexperience in running their colleges as autonomous institutions.

7.2.5 Institutions highly dependent on the state

The third category of institutions defined in relation to autonomy are weak and highly dependent on the state. Six of the 13 colleges visited were identified as falling in this category. They are not in a position to be considered for autonomy in the short to medium term. Substantial capacity building will be needed in these institutions before further financial and other responsibilities are transferred to them. Staff in these institutions are wary of the responsibilities implied by autonomy. Below are the testimonies of stakeholders in two of the institutions:

Institution One

Broadly speaking, the leadership of this ex-HoD college is not strong – they fear making decisions, taking the initiative and introducing new practices. This situation should be viewed against the background of the college's history. For many years prior to 1994 the college did not have a proper

management team. Level one staff undertook managerial duties. This environment contributed greatly to the present situation. Another problem bedevilling the college is that in the past ex-HoD colleges were not required to have a college council. It is only recently that the college has had to establish a council, which has been in existence for only one month. Consequently the management cannot run the college yet as an autonomous institution. The staff agreed that the college would require a lot of capacity building before autonomy could be achieved. They also believed that the transition should take place gradually.

Institution Two

This ex-KwaZulu homeland college does not have the capacity to finance all its programmes and therefore relies heavily on government support. The college would like to remain dependent on the Department of Education because there is no private sector involvement in the area. Staff agree that because it is not situated in an industrial area the institution would not be able to finance itself. In addition, because of the lack of leadership, management skills and administrative capacity they believe that much capacity building is needed before the college is ready for autonomy.

The examples cited in the preceding paragraphs point to the existence of a continuum of readiness for accepting autonomy, from those colleges requiring small inputs of additional support, to those requiring significant capacity development in the short to medium term, to those requiring long-term state intervention. Autonomy can only be effectively granted in phases once individual institutions are ready to embrace it.

7.2.6 Conflicting stakeholder views on autonomy

Interestingly, stakeholders hold conflicting views on greater autonomy. Students were suspicious of the idea of increased autonomy as they feared increased fees and other costs if state financial support was reduced. They also feared the abandonment of commitments to affirmative action policies in former HoA colleges if state pressure was withdrawn as a result of increased autonomy.

Staff held conflicting views on some issues. On the one hand they expressed dissatisfaction with their salary levels, holding the view that they were not being paid as tertiary-level lecturers, but as school teachers. On the other hand, they were strongly opposed to more flexible salary policies that would give college managements more freedom to determine salary levels, to top up the salaries of technical experts recruited from the private sector, and to increase the salaries of meritorious staff. College staff feared that rich colleges would privilege their employees at the expense of poorer colleges. They demanded the continuation of national norms and standards for salaries. Indeed, the FET Act of 1998 supports the latter position, making remuneration policy subject to the Education Labour Relations Council. College managements will then have little freedom to top up the salaries of scarce expert and excellent staff.

Councils were on the whole in favour of increased autonomy but were sceptical about their senior management teams' ability to take over all the state functions in running colleges. They were of the view that capacity-building programmes in financial and information systems management were critical, as was the acquisition of additional personnel such as finance registrars and extra administrative help.

7.2.7 Gradual pathways to autonomy

It is clear from the inputs received from colleges on the issue of autonomy that it is a complicated and sensitive matter. In addition, autonomy will never be absolute but partial, reliant on the state to continue fulfilling a number of key functions such as paying staff salaries and establishing national curriculum norms and standards. And lastly, it is inevitable that the pathway to increased autonomy will be staggered, with well-managed institutions leading the way in the short term whilst others will require substantial capacity development and state support for a long time to come.

7.3 RESPONSIVENESS

A major objective of the new FET policy framework is to make FET institutions such as technical colleges more responsive to their neighbouring environments, especially with regard to the needs of other ET institutions, industry and the local community. The site visits to 13 of the 25 institutions in KwaZulu-Natal highlighted a number of remarkable innovations that have made certain technical colleges very responsive to the neighbouring ET institutions, industry and community. However, a high degree of isolation still characterises the large majority of colleges under study.

7.3.1 Success stories: innovations in the technical college sector

7.3.1.1 'Self-help' ethic

A striking characteristic of innovative institutions is their determination to achieve their objectives irrespective of the obstacles in the way. For example, in a number of colleges, workshop staff do much of the maintenance work around the college and build many of the items needed in the workshops and

lecture rooms. One ex-DET institution is deploying the students of the building division to build a new brick-laying workshop, while another institution is building a sports changing room. A third is deploying its technical students to undertake overall maintenance of the campus. The staff involved are innovative and seek ways to acquire materials at low cost. These initiatives simultaneously provide valuable practical training and create sought-after public facilities. They also inculcate the entrepreneurial spirit in a very direct way. In contrast, many other institutions do nothing about the lack of practical training opportunities, workshop facilities and budgetary limitations. They sit and wait for the state to 'provide'. Observations at an ex-homeland institution illustrate this contrasting situation:

> The building course offers practical training in building and plastering. Students who take the course are expected to be able to construct a wall as part of their practical. Such walls are demolished once the moderation has been done. A new batch of students have to start all over again. We found it disturbing to see all the run-down buildings at this college. The institution could function more cost-effectively and solve a whole range of problems by getting the students to repair the collapsing walls instead of engaging in the costly practice of building small walls for training purposes and then destroying them afterwards.

7.3.1.2 Partnerships with HET using IT and satellite technology

Another area of dynamic innovation in the college sector is collaboration with tertiary institutions in the delivery of new and exciting courses. One ex-DET college is working on a new course entitled 'Computer Network Engineering' with the M L Sultan

Technikon. Two other institutions are offering Bachelor of Business Administration degrees, and one a Master of Business Administration degree in co-operation with Potchefstroom University – all via satellite and distance education technology. These colleges can make such innovative changes because they have been proactive in developing IT infrastructure. They are fully networked and can plug relatively quickly and easily into the new satellite and worldwide web technologies. There is a determination among these leading colleges (most of them ex-HoA institutions with the exception of one ex-DET college) to offer tertiary level education and training of high quality in co-operation with established universities and technikons. In addition to these dynamic initiatives, some colleges are linking up with Technisa to provide additional HET courses through the medium of more traditional correspondence methods. Ironically, few of these institutions have considered partnerships with the school (GET) band – perhaps an area where far more innovative linkages are necessary. We will return to this point later.

7.3.1.3 Responding to new employment growth sectors: educare, haircare, food and tourism

Further dynamic innovation has been the provision in a few leading-edge colleges of 'N' and shorter customised courses in key new growth sectors of the KZN economy – small business activity (educare, haircare, garment making and food services) and tourism. These initiatives entail the creation of practical training and work experience opportunities for students from disadvantaged communities whilst also opening up possibilities of self-employment in a SMME. An ex-DET college is offering customised courses to combat the high unemployment and to get community members involved in the informal economy. To this end, two courses in garment making and home economics of 12 weeks duration are on

offer. Workshop facilities were built specifically for this purpose. In another ex-HoA college the focus of SMME training is on educare students. The plan is to convert underutilised college hostels into a daycare facility that will provide students with opportunities to receive practical training and gain experience in running a small business. In other colleges, haircare courses, often only one-year long, have been established to train hair workers who then do internships in township hair salons. Many of these students are finding employment in the townships in such salons. Some are starting their own salons. Similar initiatives are taking place in the food services sector. As a form of practical training and work experience, students are encouraged to advertise their services and take on outside catering. Again, many of these initiatives are thriving micro-enterprises. At least four of the institutions visited are planning to introduce food services and tourism courses into their 1999 curriculum. These developments mark a major shift away from the traditional apprenticeship courses toward new employment 'niche' areas in the province.

7.3.1.4 Responding to the informal economy: Ntsika

Perhaps the most developed of all these small business or SMME activities is the Ntsika project initially launched by the national Department of Trade and Industry (DTI) and enthusiastically adopted by an ex-DET technical college in the province. The college is currently working with Ntsika, the Rainbow Economic Initiative and other NGOs in the SMME field. A full-time contract project manager has been employed to further this 'technopreneur' project – the nomenclature used by Ntsika and DTI. The main focus of Ntsika and its partners is to implement the idea of 'clustering' – bringing together a number of small informal businesses into a SMME industrial park and providing supportive infrastructure, training and easy credit. The college has set up a task team of

members of the college and community. Their role is to identify potential beneficiaries of the programme.

The training provided by the college involves elements of business planning and specific skills training such as bookkeeping. It is a needs-driven training model. The trainees are then linked to mentors whom they 'shadow' to see how a small informal business actually operates. The aim here is to socialise the trainee into good work habits. The college (along with Ntsika, Rainbow and other NGOs) is aiming to get SMME businesses up and running in small manufacturing fields such as welding and bricklaying. The college has already established a small industrial park on land available to it.

The Ntsika project manager at the college believes that this SMME route should be vigorously pursued by technical colleges. Business are already re-directing money away from the N1-N3 type of training to entrepreneurial training for SMMEs. He believes the colleges have a real contribution to make in terms of the ET requirements for SMME development – college workshop staff have the technical know-how and production experience that can be shared with SMME trainees. This project was the most dynamic and ambitious programme observed throughout the entire KZN college sector.

7.3.2 Isolated institutions

The above examples are the 'exemplars' in the province – these innovative practices are the products of hard work by individuals and departments within colleges. Few colleges could be described as innovative and responsive in their entirety. Indeed, there are many colleges which have few or no linkages, and which are not innovative at all. They remain isolated from the wider dynamics of change in education and training, industry and the larger society. In our observations, a number of institutions had no innovation under

way of any kind. Regrettably, most of these institutions came from the historically disadvantaged categories. Although the track record of innovation in the province has by no means been dominated by the ex-HoA (white) colleges, with one ex-DET college clearly outperforming a number of ex-HoA colleges, most of those institutions disadvantaged in the past still carry that historical baggage. They will need significant capacity building and support to overcome the obstacles to dynamism and change.

Various interactions take place between the colleges and other ET, industrial and community institutions. However, most of the linkages are informal:

> A number of ET institutions exist in the immediate vicinity of the college. The form of co-operation between the college and these institutions relates mainly to sport, student referrals and the sharing and loaning of resources such as textbooks and workshop equipment. Staff indicated that they interact with these institutions on an individual basis and not as part of a formal partnership or on-going agreement.

There are many reasons for this minimal level of networking. The main one is the all-pervasive demotivation and low morale among academic staff. There is simply no incentive for staff to do the hard work required for innovation and to put these external linkages in place. Other contributing factors are the stigma attached to technical education, the 'snobbery' of teachers in academic high schools who are not interested in linkages with technical colleges, and the politics of demography – some of the colleges are located far from the industrial heartlands and large townships of this country.

But more remarkable is the attitude towards employers. Most colleges have a problematic relationship with business because, they are dependent on employers being interested in their graduates if

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their institutions are to acquire a reputation for success and excellence. Consequently colleges are reluctant to criticise the poor training track record of business in South Africa. In fact, colleges continually excuse employers for their minimal contributions, referring to the recessionary conditions over the past decade. This is however not entirely true as during the period 1993-1996 the GDP grew at almost 4% and economic forecasts were positive. During this growth period, colleges derived few benefits in terms of increased partnerships with industry or higher placement rates. Ironically, colleges were quick to lay the blame for low levels of quality and low employment placement rates at the doors of the Department of Education and students. Employers remained the 'untouchables'. This passive-dependent and apologetic relationship with employers must change if employers are ever to meet the high expectations held of them in terms of FET expansion in the future. Such an attitude has led to massive inertia across the college sector with staff abandoning the idea of even approaching business for support on innovative projects. Staff believe such approaches are a waste of time because of the austere financial conditions prevailing at present.

7.3.3 *Links with other ET institutions*

As mentioned earlier, there are few links between technical colleges and senior secondary schools. There are various reasons for this as was observed at one ex-HoA college:

> An interesting feature of the college is its social isolation from other education and training institutions in the vicinity, for example a number of schools, another technical college, a skills centre and a teacher training college. Some of the lecturers are involved in sport activities at other colleges, but this seems to be on an individual basis only. According to

council members the negative image of the technical colleges may contribute to this situation. Although they have invited neighbouring schools to participate in joint activities this strategy has been unsuccessful owing to the snobbery of especially white high schools and the vast distances between the college and former black high schools. At times institutions such as churches use the facilities of the college, but other forms of interaction seldom take place. Institutions are invited to each other's meetings, but there seems to be a mutual lack of interest and support for each other. A possible reason for this situation of 'minding your own business' may be the survival struggle most educational institutions perceive themselves to be in.

It is clear that there is a superficial sharing of resources among ET institutions in the FET band at a local and at a more regional level. Efficiencies of cost and scale are being lost through the failure of high schools and colleges to co-operate. This is short sighted because without alternative strategies in place, the state will inevitably force rationalisation on these disparate institutions, which most likely take place on terms beneficial to the department but not necessarily beneficial to the institutions involved. The priority today should be to generate a localised and regional strategic plan for co-operation and resource sharing among ET institutions in the FET band.

In sharp contrast to the above, there is ample evidence of a colleges' willingess to co-operate across the FET-HET divide. Many colleges are offering programmes in HET in association with HET institutions. At the leading ex-DET college in the province, linkages are developing with ML Sultan Technikon around a new course on computer network engineering. This will be a N5-level course taught by college lecturers at the technikon. Secondly, a satellite

distance education initiative is being developed in partnership with Wits Technikon for tertiary study at N5 and N6 levels. And lastly, there are plans to set up a satellite campus in the Mandini industrial area with Natal Technikon.

At an ex-HoA college similar initiatives are under way. At this institution there is co-operation with the University of Potchefstroom in presenting a Master's and Bachelor's degree in business administration via the Africa Growth Network (AGN) satellite system. In addition, the BED degree, HDE and Nursing Diploma are also presented in co-operation with the University of Zululand. Many other campuses are following in these two institutions' footsteps. The implication of the absence of partnerships between colleges and high schools, on the one hand, and the emergence of solid linkages between colleges and HET institutions and the related growth of N4-N6 courses at colleges, on the other, is that the phenomenon of academic drift has arrived in South Africa. The desirability of this drift and its full implications for the country's human resources development needs across all the levels of the NQF – especially the intermediate FET levels – are not yet clear. This matter will require further attention in the policy debates at FET and HET levels.

Interestingly, only one (an ex-HoR) college was positively disposed towards institutional co-operation and merging:

> The management team and the staff at this college seem eager to improve the image and standing of the college. Various options are being examined, including clustering and forging links with a surrounding community college. This initiative seems to have some potential, as all the role-players are eager to get it going. There is a great deal of teamwork among staff.

Perhaps this college will show other institutions the way towards co-operative institution building which will witness a new institutional form emerging from the negotiations on clustering.

7.3.4 Responsiveness in relation to community

Technical colleges, in general, are not very responsive to community needs, particularly those of the disadvantaged communities from where most of their students now originate. Some colleges have responded innovatively to the challenge of unemployment by offering short courses in self-employment skills. For example, one former DET college is offering a number of self-enrichment courses in areas such as bricklaying, PC skills, fitting and machining, plumbing and carpentry. They are offered for 40-50 hours at a cost of between R480-R650. More intensive courses are also offered at this college in an attempt to involve community members in the informal economy.

Some adult basic education and training (ABET) courses are also on offer although there are serious funding and other constraints on a more expanded provision of ABET. For example, ABET classes after hours have come to a halt in many colleges because of the high levels of crime at night and over weekends.

Beyond these types of self-employment and ABET courses, college assistance to disadvantaged communities is limited. Leisure or life skills courses – such as computer skills, cultural enrichment and flower arranging – are on offer, but these cater to the more affluent classes who structure their leisure time and pursue various hobbies.

By far the most insurmountable problem has been the rapidly changing student profile – predominantly Zulu-speaking learners in all colleges – who tend to live in communities far from the former ex-HoA, HoR and HoD colleges. As such, these colleges are deprived of a natural 'neighbourhood' relationship with the

community from where their students come. Community outreach or extension services are difficult to establish when the natural community the college is serving is at a distance and when transportation costs and crime make traversing that distance difficult. Another implication of this problem is that many disadvantaged communities are unaware of the existence of these colleges.

A further complicating factor is that some colleges appear to display a political hesitancy regarding social responsibility, equity and community development issues, and as a consequence little has been done in the form of non-formal and SMME courses catering to the black community. Some college principals maintain that this linkage with the community is the responsibility of neighbouring community colleges that are emerging across the province.

Although the KZN Department of Education acknowledges the need for a significant shift to new types of course provision that will address self-employment, ABET and SMME needs, the department has done very little to kick-start this shift.

7.3.5 Responsiveness in relation to industry

A revealing insight from the 'responsiveness' surveys is that the parastatals Iscor (and to a lesser extent) Eskom and Sasol, are still the most important linkages with industry for the technical colleges. Historically, these parastatals underpinned the apprenticeship system through their large-scale training of white apprentices. Indirectly, they also contributed to the artisan needs of the private sector as a consequence of the high levels of poaching by private industry in the past. In the current period, Iscor has a policy of supporting all technical colleges within its territorial reach by continuing to offer apprenticeships (although at a greatly reduced level when compared with enrolments in the past), and also by

contributing donations of up to R20 000 annually for staff development and internal training in the colleges, and by making its training centres available to colleges for practical training purposes. Iscor encourages representation of its senior staff on many of the college councils.

Links with industry are less developed outside the parastatals. They tend to be *ad hoc* informal arrangements as the demand for training arises. Many companies ask the colleges to customise short training courses for their specific needs. There are several routine linkages with industry, for example through accreditation relationships with certain Industry Training Boards (particularly the Building and Metal Industry Boards) and some professional bodies such as the South African Engineering Council and the Professional Association of Accountants Board.

Other 'soft' linkages with industry include the hosting of industry days and career expositions as joint efforts to attract more school students into technical ET. Colleges also endeavour to place their students as interns with industry to give them work experience and practical training. There are some good exemplars in this regard although, as noted earlier, these co-operative practices are limited. More informal methods include 'word of mouth' networking and monitoring of industry trends:

> No formal market research activities take place at this college and it seems that the training needs of industry are mostly identified at an individual level through individual contacts and analysis of job advertisements. This rather informal arrangement is ascribed to the lack of manpower in the college. Nonetheless, lecturers are required to submit an annual report on their links with industry with the emphasis on the training that is needed. They are encouraged to spend

time in commercial/industrial settings. This sometimes leads to the creation of additional courses in order to meet the needs of industry.

Few colleges have developed formal information-gathering techniques to enable them to gauge market demand for their training programmes. Labour market studies, needs analyses and tracer studies are not undertaken by or for the college sector, leaving them with little formal intelligence about their client market. Limited labour market data are used in the strategic planning exercises the colleges undertake periodically. Ironically, it appears as if the regional office of the Department of Labour and Iscor's HRD desk have commissioned a number of needs analyses but this information has not filtered down to the KZN Education Department or the colleges themselves. It is likely that this is also the case in other state departments (who have undertaken analyses of their skill needs but have not communicated the findings to the college sector) highlighting the importance of interdepartmental and cross-sectoral state co-ordination. This is not happening as yet despite the rhetoric of an integrated ET system and a HRD plan for the whole country.

7.3.6 College-industry partnerships

Three observations need to be noted at this point. Firstly, a distinction should to be made between industry's corporate social responsibility programmes and the formation of real college-industry partnerships. The former activity may lead to donations to colleges for the creation of necessary infrastructure, for example computer laboratories. This is a one-way dialogue with little college input. Real college-industry partnerships involve, firstly, the training of employees in the enterprise, and, secondly (in higher-level partnerships), college technical input into the improvement of plant processes and products. Past partnerships in South Africa have had

more to do with the former activity – the acquisition of corporate grants, and even this activity has been limited by the ongoing recession.

A second and related observation concerns the fact that in South Africa there has been no formalised tradition of college-industry partnerships, unlike in the more advanced economies under the new conditions of globalisation. Elsewhere in the world, ET institutions are proving invaluable to industry not only in terms of training for a more skilled labour force (a critical precondition for success in a globalising ecpnomy) but also in terms of assisting in the continuous improvement of plant processes and product innovation (a second critical precondition for economic success under global conditions). There are few indications that industries and colleges in South Africa have broken with past traditions and are now beginning to form real partnerships. This shortcoming will limit economic growth potential in the long-term.

The above problems relate also to emerging markets such as the services and tourism sectors. Although colleges have responded in terms of course offerings in these fields, they are not part of any strategic initiatives with employers to promote these new employment sectors. For example, the government has introduced spatial development initiatives along KwaZulu-Natal's coastline with the specific aim of promoting ecotourism, but the colleges appear to be completely uninvolved in this development.

A third observation concerns a point already made but requiring repetition here – the college-industry relationship continues to be dominated by the apprenticeship model even though that model is outdated. Apprenticeship in this context is strangling other initiatives that could trigger stronger college-industry links, for example in the SMME, informal economy, self-employment, local and regional government and emerging market (for example,

ecotourism) sectors. Each of these new sectors have distinct training needs that have not been addressed adequately by other ET institutions. Colleges could play a crucial role here, but it would require a paradigm shift away from the apprenticeship model. Change would require, firstly, making curriculum design more flexible and responsive to employer needs by ending the centralised control over the N1-N3 courses and by allowing greater college autonomy in the introduction of relevant programmes. The national Department of Education should continue to play a critical role, but one that is less bureaucratic and more dynamic, recognising the diversity of training needs required today. It should lead the process of curriculum renewal and institute flexible regulation of national norms and standards.

Some colleges do not offer engineering programmes but instead have chosen to specialise in secretarial/commercial subjects. The constraints of apprenticeship and indenturing contracts do not apply here but, again, colleges have failed to establish strong relationships with employers in these fields. Many of the college graduates with commercial subjects also struggle to gain practical training, work experience and employment.

7.3.7 Overcoming passivity

In summary, colleges in general are passive and defeatist about forming partnerships with industry and business. They have no strategies to form partnerships with industry as a source of funding for the college and placement for the learners. They view business as 'untouchable' and unable to assist because of the continuing recession and the skills levy imposed by the new Skills Development Act.

These patterns of inertia and passivity must end. Dynamic and creative initiatives are needed to trigger greater linkages with

industry such as the establishment of 'extension service departments' in all the technical colleges which would be responsible for pioneering new and dynamic relationships with industry. The brief of such a college department should be wide, incorporating:

- Designing customised training courses for the private sector 'on demand'.
- Fundraising for the college and pursuing corporate social responsibility grants.
- Providing student work experience and job placement services.
- Offering college technological expertise to the private sector through consultancy services.
- Undertaking or commissioning periodic labour market/tracer studies to gather strategic information on changing employment patterns and skill needs in specific localities and using this information for strategic planning purposes in the college.
- Marketing the college and improving its image, enrolment and quality.

Endnote

1 A clause of the FET Act, inserted at a late stage before the legislation was passed in parliament in late 1998, now disallows this prospect of strong autonomy. Staff establishment posts and salary levels continue to be the prerogative of the head of the department in the provincial administration.

Chapter 8

CRITICAL OVERVIEW: THE NEED FOR LABOUR MARKET AND INSTITUTIONAL REFORM

Andre Kraak

8.1 INTRODUCTION

This chapter will focus on two critical recommendations. One concerns structural change – the development of a more regulated labour market interaction between ET institutions and the world of work. The other concerns institutional change – the creative restructuring of the institutional landscape to form fewer but more cost-effective, better-resourced multi-campus FET institutions that are more responsive to the social and economic development needs of post-apartheid South Africa.

8.2 DYSFUNCTIONAL LABOUR MARKET: THE NEED FOR STATE REGULATION

One of the more alarming observations arising from the results of the KZN technical colleges study is the entirely dysfunctional nature of the labour market within which these institutions are

located. The 'labour market' can be understood to consist of all those social institutions and processes that mediate, determine or effect the purchase and sale of labour power. The labour market plays a crucial mediating role in the relationship between education (in this study, technical colleges) and the world of work. In short, the labour market is that social institution which channels educated and trained agents from ET institutions into places of employment. As such, a labour market can therefore be understood to comprise

- ET institutions such as secondary schools, technical colleges, technikons and universities;
- key government departments (Education and Labour) and other government agencies (such as employment bureaux and youth training centres) as well as relevant government legislation (such as the Labour Relations, Employment Equity and Skills Development Acts);
- key social processes such as those which lead to discrimination and exclusion in the labour market and which disadvantage or privilege certain social groupings in terms of access to employment;
- employer organisations with policies on employee training and human resource development in their economic sectors;
- the world of work which determines the level and quantity of employment opportunities in each economic sector and demographic location across the country.

An effective labour market environment is one where the above set of social institutions and processes successfully channel trained agents (especially the youth) into places of employment. A dysfunctional labour market is one where the above set of institutions do not function as an effective co-ordinated whole. The labour market fails to place trained agents into meaningful employment. It is characterised primarily by the collapse of the

youth labour market. It is young people fresh out of schools and colleges who suffer the most.

The above scenario can be expressed differently along a continuum of labour market types. Table 8.2 below identifies three ideal types of labour market interrelationships with educational institutions:

Table 8.2: Three labour market scenarios

Responsive labour market	Dysfunctional labour market	Regulated labour market
Characteristics: Courses are highly responsive to client needs. Industry and community clients are satisfied with the outputs of the system. Students have a reasonable chance of getting jobs. The 'market' mechanism works reasonably well.	Characteristics: There is a total mismatch between the outputs of the college system and the skill needs of the economy. Employers do not employ graduates of the colleges. Most students fail to find jobs. College certificates do not add value to their school qualifications. The system is dysfunctional.	Characteristics: The market mechanism alone can not be relied upon to 'signal' the real skills demands needed if economic growth and social development are to be attained. The state should play a role here and should signal to colleges and other ET institutions the kinds of course offerings required. The state should indicate which skill areas are priorities for the national and regional economies.

The first scenario, that of a 'responsive labour market' is the orthodox economic position articulated most regularly in the business media and within management circles. Such and environment is characterised by demand-led educational delivery which is responsive to employer needs and which, in theory, translates into higher levels of skilled labour employment. Key characteristics of this scenario are that a significant proportion of trainees are already

employed by companies or are the beneficiaries of employer sponsorship and bursaries. Another key characteristic would be a high level of labour market information that accurately signals which occupational fields provide the best possible employment prospects and which fields of study are the most profitable to pursue. All of these ingredients, taken together, are what make a labour market 'responsive'.

A 'dysfunctional labour market' scenario is the one that characterises the technical college-employment relationship in KwaZulu-Natal and probably more widely across South Africa. In this scenario there is a low correlation between training in specific technical and commercial fields in technical colleges and *actual* employment opportunities in the external economy. In this scenario, there is a low incidence of employer sponsorship of training and, as a consequence, a high incidence of unemployment among graduates of college programmes. These are precisely the characteristics that prevail in KwaZulu-Natal: low employer sponsorship rates and very low job placement rates.

8.2.1 Need for a regulated labour market

The 'responsive' and 'dysfunctional' types occupy the extremes along the continuum of labour markets. In reality, a truly 'responsive' labour market environment is never achieved, particularly in relation to vocational training and human resources development. The market is not adequately responsive for a number of reasons, the primary one being that individual employers act opportunistically in pursuit of the profit motive. They operate with short time horizons that do not assist in the development of the longer-term human resources required by the national economy as a whole.

There is now a significant body of international literature that emphasises the importance of institutional arrangements and governmental legislation which impinge on the functioning of the market mechanism and which cede to the state and organised labour a role in economic development (Streeck, 1992; Finegold, 1991; Locke, Kochan and Piore, 1995). These institutional arrangements elsewhere in the globe have acted as catalysts for growth and global competitiveness – contrary to neo-liberal orthodoxy. This is because the market mechanism is unable to provide all of the inputs necessary for success – especially those factors of production that cannot be acquired by individual employers through private property rights. These inputs are termed 'collective factor inputs'. They are the non-market, non-price, collective goods that are becoming increasingly important in the new global economy. For example, the need for industrial peace, co-operative work relations and multi-functional skill competence are crucial elements in the quest for higher productivity but they are not readily provided for by individual employers functioning within the 'free market'. What is therefore critical in this new global environment is the existence of a strong institutional environment that encourages training activities in the labour market across the occupational spectrum. The effectiveness of the labour market in Germany, for example, is largely due to its highly legitimate apprenticeship system and its immersion within a well-articulated set of supportive institutions. These include the 'dual system' of ET; a highly organised network of chambers of commerce and industry committed to high-quality generic skills training in a wide spectrum of occupations; and co-determination of rules that protect occupational categories and act to incorporate business's social partners in a highly regulated system of labour market and ET governance (see Kraak, 1997).

The alternative, then, to the myth of a truly (market) responsive environment and to the dysfunctionality of the current labour market in KwaZulu-Natal is clearly a 'regulated labour market model' in which the state plays a significant role. The state's role would be, firstly, to stimulate growth and employment in new strategic economic sectors (for example, the services, tourism and the informal economy) thereby *creating* demand for training within enterprises and in technical colleges.

Secondly, the state should position the national economy for an uncertain, more diverse and higher-skill future. This will entail current demand-led training activities being fused with the development of future ET capability (supply led). Such a broad ET challenge cannot be realised along the market-led route. It requires an appropriate combination of market forces and state efforts, a combination of demand-led and supply-side strategies, of enterprise-based and institutionally based training (for example, in technical colleges). In short, demand for increased training in the current period and in the future will not evolve merely as a voluntarist outcome of rational employer action. It must be created by innovative state regulation that will act to stimulate rather than hamper and stifle demand for training.

The analysis in this report favours the development of a 'regulated labour market' environment. The state will need to identify new strategic industries where skills will be required in future. It will need to assist in the identification and development of new strategic sub-sectors in the high-tech (for export) sector, and in the services, tourism and informal sectors of the region and, in so doing, indicate the priority skill requirements for each of these sector in the future. It will need to find effective ways of communicating these labour market requirements to ET institutions (such as technical colleges) so that they can adapt their supply-side responsibilities to meet the

growing demand for skilled labour in the future. This will require a high degree of state and ET institutional planning and co-ordination that is currently not taking place.

8.2.2 *Factors contributing to labour market dysfunction*

8.2.2.1 Jobless growth

The first obstacle to a more effective labour market interaction between ET institutions and the world of work is the phenomenon of jobless growth that has characterised the South African economy since the early 1990s. Although there has been a slow increase in the gross domestic product from negative percentage measures in the 1980s and early 1990s (-2% in 1983 and -2,3% in 1993) to levels approaching 4% in 1995/1996, this has been achieved without any significant increase in employment levels. In fact, in key sectors such as mining and manufacturing, there have been significant contractions in employment over the same period. Even though the informal economy and tourism sectors have benefited from the political changes begun in 1990, accurate statistics of growth in these sectors are difficult to come by. However, it does appear as if employment increases in these new sectors have tended to be concentrated at the low skill end. In short, although the political, social and educational opportunities have changed considerably for the better, the economic fundamentals still remain the same, with the result that many black technical college graduates struggle to find employment.

8.2.2.2. Transition and decline in the apprenticeship labour market

Jobless growth is not the only constraint on black technical college graduates finding employment. Perhaps equally important has been

the deracialisation and simultaneous collapse of the apprenticeship labour market in the past decade. Table 8.2.2.2 attempts to highlight this change graphically:

Table 8.2.2.2: Transition in the apprenticeship labour market, 1960s to1998

Labour market for college-trained apprentices early 1960s to mid-1980s		**Labour market for college-trained apprentices by late 1990s**
White apprentices racially included. Black labour racially excluded. Apprenticeship central regulator of labour market. Trainees sponsored by employers. Trainees part time, have jobs.	TRANSITION TO →	In legal statutory terms, labour market deracialised. In social terms, labour market unchanged; most skilled workers still white. Apprenticeship system defunct/dead. Black labour can't get jobs. Trainees full time, not sponsored by employer, struggle to get jobs.

Racial segregation policies prior to 1948 and apartheid policies since 1948 put in place a particular set of social institutions and statutory frameworks that constituted the apprenticeship labour market in the period up until the early 1980s. Legislation excluded blacks from becoming apprentices in the so-called white areas of South Africa, and even after the repeal of these statutes with the findings of the Wiehahn Commission in 1978 and the passing of the Manpower Training Act in 1981, recruitment of apprentices has remained predominantly white.

In the era of the great apartheid economic boom (late 1950s to early 1970s) almost all students at technical colleges were apprentices who were sponsored by industry to study in mainly technical/ engineering fields. They trained part time in block release format, working for their employer for the rest of the time. They had access to work experience and received practical training from senior artisans on the shop floor. However, this model was never perfect, with many apprentices receiving little induction and with some being used in full production activities at cheap trainee wages.

In the period since the statutory deracialisation of apprenticeships (1981), and more recently with the rapid deracialisation of technical colleges (since 1994), these social conditions have been dramatically inverted. Ninety percent of students are now black. Most study full-time with no employer sponsorship. Job placement rates after training are estimated to be at an average of about 15%. Employer indenturing of new apprentices has dropped from 11 573 in 1985 to 5 002 in 1994. Figures for the population distribution of indentured apprentices are hard to obtain as the previous government decided in 1990, ironically, to end publishing manpower figures according to race classification. The most recent figures, therefore, are those of 1990. Of the total of 9 054 indentured apprentices, 6 709 where white (74%), 871 were coloured (9,6%), 523 were Asian (5,8%), and 951 were African (10,5%) [CSS, Labour Statistics, 1994: 3.57]. Given the massive drop in the indenturing of new apprentices, it is unlikely that the racial composition has changed dramatically since 1990.

All in all, the new nexus of social institutions and social processes that have come to make up the 1998 apprenticeship labour market is highly dysfunctional, particularly for the young black students hoping for employment once they have graduated from college.

Technical colleges shifted away from training only for apprenticeships in the technical/engineering fields some time ago. However, the evidence from KwaZulu-Natal of job placement rates for students trained in the commercial/business fields does not appear to be any different from the trends described above. The new labour market environment surrounding technical colleges appears to be premised on the continued exclusion of blacks from reasonable access to jobs even after the legal and institutional barriers to their inclusion have long since been withdrawn. It is clear that South Africa's technical college model founded historically on a close articulation with a racially defined apprenticeship system is fundamentally inappropriate to today's changed political, social and economic conditions.

8.2.2.3 Poor demographic planning

A further contributing factor in the malfunctioning of the labour market is the poor demographic planning undertaken during the apartheid era, which has resulted in many technical colleges being spatially displaced from the industries that seek college graduates and the communities that support them. Technical colleges under the control of the former DET, HoD and HoR administrations were deliberately located away from the formerly white central business districts and industrial areas. As such, these institutions are not geographically positioned to be 'responsive' to neighbouring industries. Furthermore, almost all colleges today recruit students predominantly from the black townships which in the case of the former HoA, HoR and HoD institutions, are (in most cases) located at a distance from the black townships. As a consequence, no notions of neighbouring 'community' have emerged – a factor that has crippled the extent to which these institutions have been able

(and will be able) to be responsive to the social, cultural and lifelong learning needs of the community.

8.2.2.4 Unresponsive institutions

A final factor contributing to the dysfunction present in the labour market environment is the passivity and dependency that characterise most of the technical colleges. They have not been able to act decisively and independently of the state in forging a unique identity for themselves. Creativity and flexibility are not characteristics that describe this sector. Few attempts have been made internally at developing these institutions so as to break free from the bureaucratic chains that suppress innovation – although of course there are some notable exceptions. Institutional mediocrity of this kind is a powerful constraint on change that will limit the possibilities for improvement in the future unless drastic remedial action is taken now.

8.2.3 Additional conditions necessary for the success of the new FET policy

The new FET policy framework represents an important beginning in establishing a more regulated labour market environment that will seek to balance market 'responsiveness' with supply-side infrastructural development and longer-term skill formation. However, this FET framework will not succeed on its own without the combined efforts of other cross-sectoral state-planning initiatives. Most important of these are the generation of economic growth and job opportunities in key 'niche' growth areas of the province such as the ecotourism, services and SMME industries. Without these complementary processes, learners will continue to be trained by colleges for jobs that do not exist after they graduate.

8.3 RESTRUCTURING THE INSTITUTIONAL LANDSCAPE

A second area of restructuring that is required is at the institutional level – the creation of an entirely new institutional landscape. The discussion that follows will first identify the major reasons for institutional reform. The focus will then move to reviewing certain innovative although historically ignored institutional reform proposals, particularly from the 1981 De Lange Commission and the 1991 *Education Renewal Strategy* (ERS). Three more recent proposals for institutional change in the technical college sector will also be examined. The analysis will conclude with specific recommendations regarding the technical college sector in KwaZulu-Natal.

8.3.1 Need for institutional reform

A number of determinants of the need for institutional reform have emerged in the analysis presented in this book. There are two fundamental factors necessitating institutional restructuring. The one concerns institutional costs and efficiency, the other institutional effectiveness. Briefly summarised, these dual factors involve:

- Cost-inefficiencies: Chapter Five highlighted the smallness of many of the technical colleges in KwaZulu-Natal (in terms of FTEs and headcount enrolments), with 12 of the 24 state-funded institutions with FTEs lower than 600 per college. Forty percent of all institutional offerings have class sizes of fewer than 30 students per annum. These patterns cannot be justified given current budgetary constraints. Clearly, innovative strategies will need to be found to improve costs and the efficiency of provision. Inefficiencies also arise when institutions in the same locality or region offer identical courses to small class numbers.

These institutions in the past have not been under pressure to co-ordinate provision and eliminate inefficient course duplication.

- Collapse of the local labour market: Chapters Six to Eight highlighted the extent to which local labour markets associated with technical college institutions have dramatically collapsed in the past two decades. It was reported earlier that the average job placement rate of graduates from these institutions is in the region of 15 percent.

It is clear that the outputs of the technical college sector are of little relevance to the needs of employers at a time when strategies to boost economic growth and employment are the top priorities in South Africa's programme of reconstruction and development. Much of the solution will have to be found in a dynamic combination of structural change (as was outlined earlier: the stimulation of economic activity and employment through a balanced combination of state supply-side initiatives and market responsiveness) complemented by institutional restructuring of key organisations such as technical colleges to make them far more responsive to the actual needs of the local labour market.

Current analyses of technical colleges tend to put far too much emphasis on the imperative of institutional reform whilst ignoring the structural requirements implicit therein (see the National Business Initiative Report written by Fisher, Hall and Jaff, 1998). If restructuring concerns only eliminating institutional inefficiencies, such a strategy, although more cost-efficient, will make no impact on the poor articulation between these colleges and the labour market. Institutional reform, then, must be driven by the dual imperatives mentioned above.

8.3.2 Institutional reform proposals in FET, 1980-1999

Talk of institutional reform at the FET level has been on going for over two decades, although its political impact has always been marginal. Little changed in FET in the late apartheid era. However, in more recent times, institutional change in FET has become a top political priority. It is appropriate, therefore, to re-examine the proposals made over the past two decades to see whether they have any relevance for the current debate on institutional change.

8.3.2.1 De Lange Commission

Much of the 1981 De Lange report focused on the lack of mobility between the formal and non-formal sectors. De Lange maintained that the cause of this was the rigid character of formal education. There was limited horizontal flow – learners could not move readily "from one type of education to another. The structure was largely closed" (HSRC, 1981a: 96). Formal education was conservative in structure and was resistant to further inflows from non-formal education and training.

Rigidity within formal education also limited the flow between the institutions of secondary, post-secondary and tertiary education. Insufficient student mobility was taking place between schools, technical colleges, technikons and universities, resulting in the production of very low numbers of middle to high-level personnel in the technical, commercial and managerial occupational fields (HSRC, 1981b:77, 78). De Lange proposed a major institutional change to resolve this problem: the introduction of the 'Five-Year College', based on the Taiwanese experience:

> The Taiwanese have ... [since 1965] instituted a five-year course for highly selected students after passing standard seven.... The curriculum is so designed that the necessary

> practical, theoretical and general education is provided to turn out highly competent technicians, nurses, etc after five years. At present this course trains more than half the technicians in Taiwan, including the best. It is also very well suited to train people in the para-medical, agricultural and commercial fields because it relates science, mathematics and management to the concrete requirements of the field of specialisation (HSRC, 1981b:102).

The success of the Taiwanese Five-Year College is evident when comparing Taiwan's output of technically skilled personnel with that of South Africa. For every million of its population, Taiwan produces 876 technicians and 341 engineers per annum as compared to South Africa's dismal achievement of 78 and 37 respectively (HSRC, 1981a:140).

The Five-Year College proposal was geared strategically to addressing the severe skill shortages at the intermediate to high person-power levels. Students would be enrolled after having completed Standard 7. The emphasis would be on recruiting students with high aptitudes capable of occupying middle-management positions in industry. The students would be fully qualified by the age of 20. The benefits of such intensive education and training at an early age, according to De Lange, were that pupils would be enabled 'from puberty onwards to acquire the system of values appropriate to their careers at the middle level' (HSRC, 1981b:26).

Graduates of Five-Year Colleges would be able to continue their education at universities and technikons, entering such institutions at senior levels, possibly at the second or third year. Consequently, the Five-Year College would play a major role in facilitating mobility within the post-secondary and tertiary sectors.

De Lange's Five-Year College idea was quickly forgotten in the controversy surrounding the state's rejection and dilution of many of De Lange's proposals. In retrospect, the 'Five-Year College' idea deserved far greater consideration from educational planners in South Africa. It represented a first attempt at finding institutional solutions to human resource deficiencies. However, the idea was not lost entirely. The 1991 *Education Renewal Strategy* of the then Department of National Education proposed a similar innovation: the Edukon.

8.3.2.2 1991 Education Renewal Strategy (ERS)

The Edukon proposal forms part of a larger set of rationalisation reforms envisaged by the 1991 *Education Renewal Strategy* report to impact on the entire post-secondary and tertiary education sectors. These reforms incorporated a dual institutional strategy of down-grading as well as upgrading the character of universities, technikons and technical colleges. Such institutional reordering became imperative, according to the ERS, because of overlaps and duplication in the large number of instructional programmes on offer at universities, technikons and colleges; a lack of definition about the differing emphases of these institutions; and because of the need for more cost-effective education (DNE, 1991a:36-39).

Institutional downgrading would entail shifting many programmes from universities downward to technikons, especially all university-level diplomas and certificates. It would also entail a shift downward of many technikon programmes to technical colleges (DNE, 1991a: 36, 58). Institutional upgrading would entail the following changes: raising the status of certain universities into centres of excellence as post-graduate institutions; technikons offering some degree courses in technology; and technical colleges being upgraded into colleges

of further education – to be known as Edukons (DNE, 1991a: 54, 60, 61).

Edukons are viewed by the ERS as key institutions capable of facilitating greater flow between the post-secondary and tertiary sectors:

> A freer flow of students between the different post-secondary institutions is essential.... Present requirements in this regard are rather strict and rigid.... As a starting point, it should be possible for students studying at technical colleges to obtain credit for further technikon studies and for further university studies. This would mean that some technical colleges should be identified to become colleges for advanced or further education. In such an institution so-called transfer students would then build up credits towards further technikon, university or for that matter, teacher training studies. Since the resources and infrastructure of such colleges need not be as sophisticated as those of universities or technikons, such an approach could lead to very cost-effective education at this level (DNE, 1991a:60).

By playing such a role, these transformed technical colleges would be able to 'come into their own and rid themselves of their trade school image' (DNE, 1991a: 60). Edukons could have a number of functions. They could offer the academic bridging courses that are currently placing a huge burden on universities and technikons. They could also offer 'transfer credits' for study at universities/ technikons, as well as various vocational programmes (DNE, 1991a:54, 60, 61; DNE, 1992:37).

The ERS was therefore an attempt to resolve the growing demand of large numbers of black students for access to higher education. It was envisaged that the Edukon would become the largest recipient

250

of future black students. The proposals were unclear, however, on whether the Edukons would be able to provide the high-quality technical and managerial education required by a rapidly globalising economy – or whether they would continue to deliver the poor training standards of many existing technical colleges.

The historical lessons to be learnt from the Five-Year College and the Edukon idea is that they were more than simply cost-saving or economic-rationalist reforms. Indeed, they correctly sought to interface ET institutions which could train increasing numbers of future black learners more effectively with local labour market conditions and employment prospects at the intermediate to high-skill levels.

The De Lange Five-Year College is a highly compelling idea because it centres on the creation of a career development trajectory for black learners from the current Grade 10 through to the current second- or third-year level of university or technikon study. It is a concept that holds much promise given current technical college failure to project trained learners into intermediate or high-skill jobs. The idea of a Five-Year College contrasts sharply with the regressive nature of current technical college provision which is premised on the recruitment of matriculated black students only to be recycled through the N1-N3 experience with little or no added value to the competencies acquired at matriculation. College graduates' employment prospects appear to be no better than after matriculation and their general literacy and numeracy levels remain unchanged. The time has come for government to acknowledge that post-secondary vocational provision in the form of N1-N3 adds little of value to the senior secondary experience (Grades 10-12). This is an alarming statement, particularly given that matriculation has itself been inadequate for most black students because of apartheid schooling. The idea of a Five-Year College – formed from

a number of reshaped technical colleges for a selected sample of junior secondary learners who would leave school at the end of Grade 9 and enter a new five-year programme in Grade 10 – has real purchase if it projects highly skilled graduates into jobs. These Five-Year Colleges would require partnership agreements with local employers who would commit themselves to employing a certain number of graduates from such institutions. This would clearly be one way of overcoming the current irrelevance of many technical college graduates to current employer requirements.

The strength of the Edukon idea is that it attempts to improve the articulation of technical colleges with technikons and universities. Currently, few college graduates enter higher education institutions. However, as the figures in Chapter Five indicated, many courses now offered by technical colleges (N4-N6) are formally classified as higher education programmes on the NQF and, as such, these courses should facilitate greater access and credit accumulation opportunities for college learners wishing to enter higher education. The fact that access is still restricted has to do with issues of quality and equivalence between college and university/technikon courses. Again, the Edukon idea may provide a useful basis for the formation of institutional agreements between certain technical colleges wishing to enter higher education provision and neighbouring universities and technikons. What is critical in this regard is the establishment of procedures for obtaining curriculum equivalence and the introduction of quality assurance mechanisms across all institutions involved in such agreements. These arrangements would ensure greater learner progression and, ultimately, greater employability. The current N4-N6 arrangement in technical colleges is not entirely satisfactory because the labour market value of such courses has not been ascertained and access into higher education (and recognition of N4-N6 courses) is not as yet assured.

The debate on institutional restructuring in FET since De Lange and the ERS has shifted to three major topics – college provision of courses relevant to the informal economy and the SMME sector; advocating the idea of the 'community college'; and promoting 'school-college-industry' partnerships. Each of these institutional models will be briefly discussed before a firm recommendation is made with regard to institutional reform in KwaZulu-Natal.

8.3.3 Colleges and college programmes dedicated to the needs of the informal economy and SMMEs

Another feature of the institutional reordering that will be required in the future is that technical colleges will have to make a more conscious effort to address the needs of the informal economy and SMMEs. As was outlined earlier, the apprenticeship labour market that historically grew out of a long association with most technical colleges has now collapsed, ushering in the need for a new institutional linkage with local labour markets and sustainable employment. This will involve growing the informal economy and self-employment industries, for example the garment, educare, haircare, food and tourism industries dealt with in Chapter Seven. The approach promoted by the Ntsika agency towards small business development needs to be expanded across many more technical colleges in KwaZulu-Natal and the country as a whole.

8.3.4 Community colleges

Another trend evident in the recent debate on new institutional forms is the enthusiastic advocacy of 'community colleges'. Many community colleges have in fact been established in South Africa amidst the ruins of former teacher training colleges or technical

colleges. The concept is as yet undeveloped in South Africa, and although modelled on the USA experience (which is aimed at providing more open access routes into HET), the community college idea in South Africa appears to have a strong egalitarian/ communitarian thrust:

- Emphasising ease of access and progression through FET into HET programmes. Open learning methodologies, extensive student support services and flexible modes of delivery are all cornerstones of the community college experience.
- Promoting social and personal development in curriculum design in contrast to the more narrow focus on economic development in most technical colleges.
- Taking open access, redress and social justice principles seriously in enrolment policies (see NCFE, 1997:175-182).

Community colleges could play a key role in the development of capacity at local government level by equipping citizens and civic organisations with the skills needed by communities to govern themselves. This is a unique educational function for colleges to perform as schools and universities tend to concentrate on learners either too young or too eager to attain high professional office.

8.3.5 *Partnership options*

Perhaps a final institutional option technical colleges should pursue with vigour in the future is the formation of partnerships with senior secondary schools and industry located in their immediate neighbourhoods. This will provide exposure to the world of work for senior secondary students who would otherwise not obtain such experience at school. Partnerships between schools, colleges and industry will also expand the subject choices available to senior secondary students beyond the limited confines of a traditional

'academic' curriculum, allowing willing participants the opportunity of forging an incipient career in a vocational field at an early age whilst still receiving a sound formative general education. At present, schools and technical colleges live in total isolation from one another, thereby perpetuating the stigmas associated with poor vocational education in this country. These false polarities must come to an end.

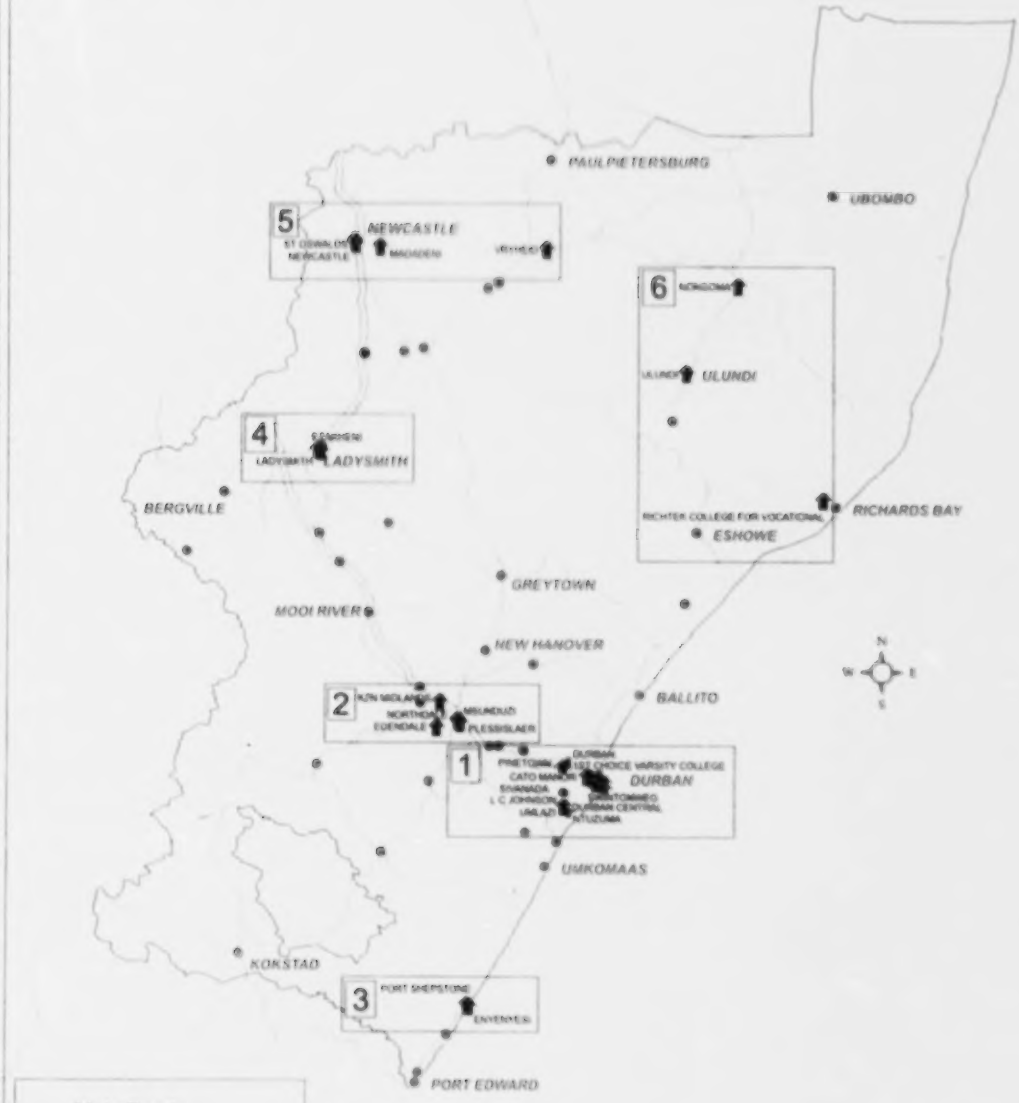
8.4 SPECIFIC RECOMMENDATION: INSTITUTIONAL REFORM IN KWAZULU-NATAL

Institutional change in the KZN technical college sector should consider the five models proposed above to improve the linkage between these institutions and the labour market. However, over and above these considerations, there is a definite case for institutional merger between colleges on the grounds of cost and resource efficiencies.

The following page contains a map of KwaZulu-Natal and the 25 technical colleges in the province. As can be seen, there are at least six geographically defined clusters of technical colleges and in at least three of them, there are concentrations of four or more colleges located close to one another in each cluster. The following discussion will focus on one of these highly concentrated clusters – the area around Newcastle/Vryheid (see map on p. 242). An argument will be made in support of merging all four colleges in the Newcastle/Vryheid area into one mega-college with a number of satellite campuses. The argument for merger is made in only one of the six possible clusters but it is equally relevant in the other five cases.

Clusters of Technical Colleges

KwaZulu-Natal *MAP 2*



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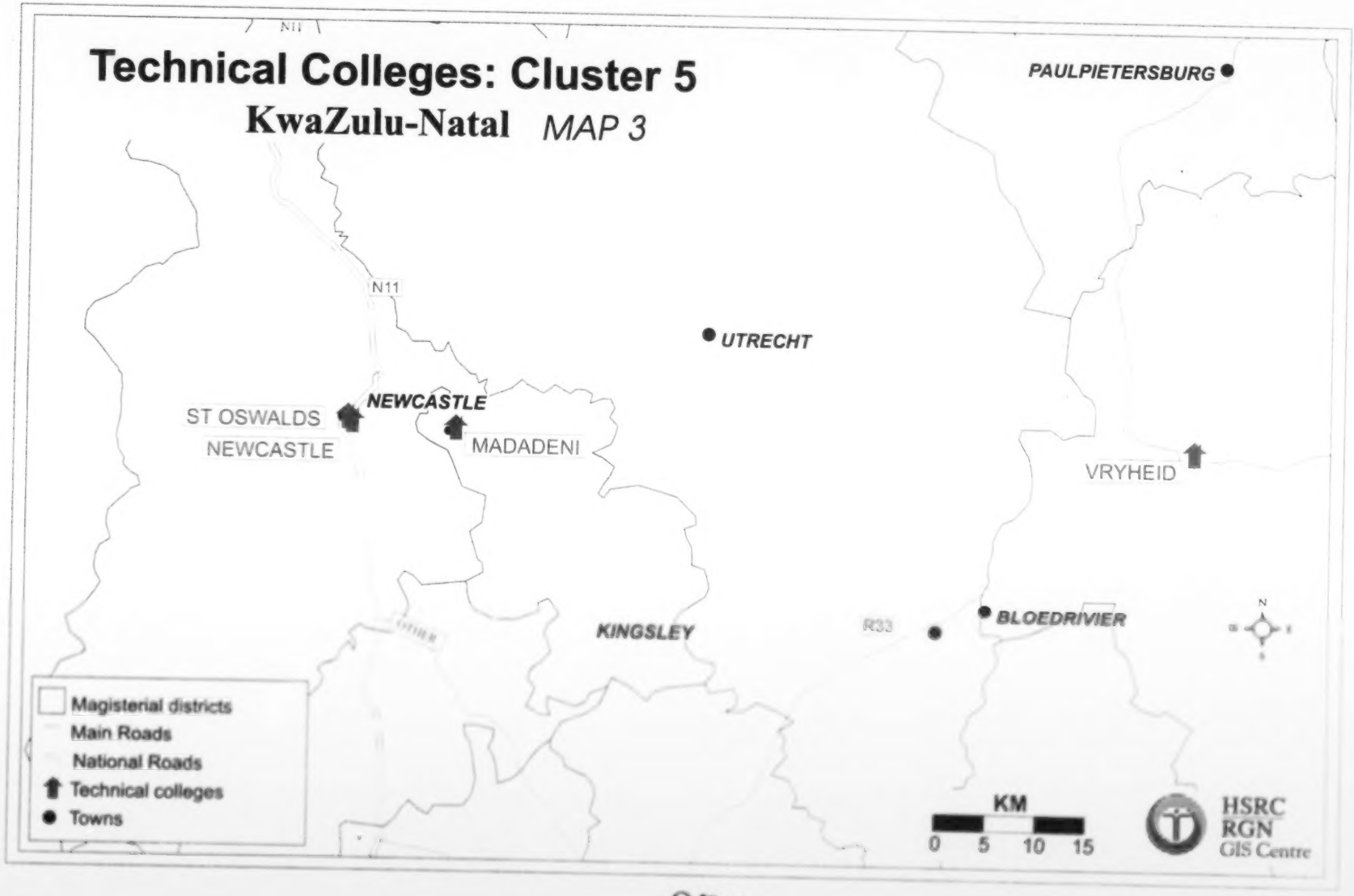
Technical Colleges: Cluster 5
KwaZulu-Natal MAP 3
PAULPIETERSBURG
N11
UTRECHT
NEWCASTLE
ST OSWALDS
NEWCASTLE
MADADENI
VRYHEID
KINGSLEY
R33
BLOEDRIVIER
Magisterial districts
Main Roads
National Roads
Technical colleges
Towns
KM
0 5 10 15
HSRC
RGN
GIS Centre

257

8.4.1 Newcastle/Vryheid region

Table 8.4.1 below summarises the wide array of geographical, quantitative and qualitative data gathered on the four technical colleges in the Newcastle/Vryheid district during the HSRC investigation into technical college provision in KwaZulu-Natal.

Table 8.4.1: Characteristics of technical colleges in the Newcastle/Vryheid district, KZN

College name	Former status	FTEs	Ratio of FTEs to admin staff	% white staff	Leadership style	Readiness for autonomy	MIS and usage of Coltech	Quality of workshops	Fields of study					% Provision N4-N6 (in FTEs)	Mean instit. pass rates	Mean instit. throughput rates
									1	2	3	4	5			
COLLEGE 1	HoA	728	121,1	100	Effective	Ready	Good	Good	•	•	•			42	62,8	59,3
COLLEGE 2	HoD	638	160,1	12	Dependent on government	Not ready in short term	Suboptimal Coltech new	Inadequate	•	•				41	81,2	76,7
COLLEGE 3	KwaZulu Homeland	1 007	168,1	33	Dependent on government	Not ready in short term	Suboptimal Coltech new	Good although not used								
COLLEGE 4	HoA	261	87,1	100	Effective	Ready	Good							62	79,9	74
TOTALS (where applicable)		2 634														

FIELDS OF STUDY
1 Engineering
2 Business
3 Utility industries
4 Social services
5 General Education

A number of conclusions can be drawn from the above information on technical college provision in the Newcastle/Vryheid district:

1 *Geographic proximity*: Three of the four colleges in the Newcastle/Vryheid district are in very close proximity to each other, whilst the fourth is located approximately 100 km to the east.

2 *Variable size of institution:* The size of institution varies across the four colleges in Newcastle/Vryheid, from small (with an FTE total of 261) to large (with an FTE total of over 1 007). Clearly the smaller college is less cost-effective. A single merged institution would obtain an FTE measure of 2 634 which would lead to substantial cost-efficiency gains.

3 *Uneven share of administrative staff*: One of the legacies of apartheid planning has been an uneven and unfair distribution of administrative staff, with one college managing a comfortable 87.1 ratio of full-time equivalent students to administrative staff, whilst a neighbouring technical college suffers under the burden of a 168,1 ratio – almost double. A single merged institution would reduce this administrative burden markedly.

4 *Racially skewed distribution of academic staff*: Teaching staff at two of the former HoA colleges in Newcastle/Vryheid are 100% white, whilst the other two institutions are staffed predominantly by Indian (76% in the one college) and African lecturers (58% in the other college). Whilst radical changes in staff composition are required in the future to reflect the population demographics of the region, a single merged institution would provide a better basis for shifts toward a more equitable racial composition of staff.

5 *Uneven readiness for autonomy*: Two of the four institutions are

ready for autonomy while the other two are highly dependent on the state for administrative support and assistance with financial management. Autonomy for the latter two institutions would be a medium- to long-term journey if they were to travel this pathway alone. However, as a single merged institution, the administrative strengths of the two former institutions would compensate for the administrative weaknesses of the latter two.

6 *Uneven distribution of IT and MIS capabilities*: Information technology capabilities are highly skewed between the four campuses. Two colleges are well equipped to maintain an effective management information system using the software package Coltech. The other two institutions do not have the same capabilities even though they have recently acquired Coltech. A single merged institution would redistribute these MIS strengths across what were previously four discrete management entities.

7 *Unequal distribution of workshops*: Only one of the four technical colleges possesses well-functioning technical workshops. Although a second institution has excellent workshops, because of ongoing management and student problems, they have not been put to good use. The third college has inadequate technical facilities and the fourth offers courses in business studies only and therefore has no need for technical workshops. A single merged institution would benefit from the rationalisation and centralisation of these technical workshops, for example through broadening student choice by eliminating subject duplication and through offering different instructional programmes at the two institutions that have adequate workshop facilities. The same

logic would apply to other costly and sought-after facilities such as 'state-of-the-art' computer laboratories.

8 *Narrow and duplicative concentration of instructional offerings*: Data contained in Table 8.4.1 suggest that a rather narrow and duplicative set of instructional offerings is provided at all four of the colleges in the Newcastle/Vryheid district, primarily in the engineering and business studies fields, with only one institution offering courses in the utilities such as clothing and textiles, food, hair care and tourism, and with no college offering programmes in the social service fields. Clearly, a single merged institution would be one effective device whereby business and engineering studies could be restricted to one or two of the main and satellite campuses, and where conscious planning efforts could be made to expand course provision in new and neglected areas of provision at the other satellite campuses. A single, multi-campus institution would enable a more effective balancing of specialised provision in one or two sites (for example, in engineering and business) with more creative responses to market demand in the utilities and social services fields being on offer at the other satellite campuses.

9 *Addressing the academic drift towards HET:* The high degree of academic drift into HET provision, particularly in the one former HoA institution offering business studies (62% of provision at the HET level) and in the other former HoA institution offering engineering and business courses (42% of provision at the HET level) will require careful and considered intervention. Provision of HET courses should be planned and linked to partnership arrangements with neighbouring technikons and universities. Provision of this nature need not take place in all four colleges. Rather, provision of HET

courses in a single merged institution could be contained within one or two satellite campuses, with the other campuses specialising in FET delivery, particularly in new and unexplored fields relevant to the informal economy and SMME sector, or in support of learnerships.

10 *Examination results*: College examination results and, in particular, throughput rates, vary considerably between the four institutions in the Newcastle/Vryheid district. In fact, there is a 30% variation in the throughput rate between two colleges in the district. A single merged institution would have the benefit of spreading the successful teaching and learning strategies of some of its satellite campuses to other less successful divisions, thereby hopefully acting as a catalyst for improving pedagogy and throughput rates.

11 *Resolving the spatial issues*: The reconfiguration of these four colleges into one mega-college with a main campus and three satellite campuses should be sensitive to spatial/demographic issues and the location of differing racially defined communities and their access to FET institutions. Although apartheid urban planning cannot easily be undone, the findings of Chapter Six indicate that issues such as location, transportation and access to colleges are critical problems facing previously disadvantaged communities. These problems should be addressed in the institutional redesign process.

12 *New institutional forms*: The design of a restructured mega-college should take into account the lessons learnt and potential benefits accruing from De Lange's 'Five-Year College', the ERS's 'Edukon' and the more recent advocacy of 'community colleges' and institutional 'partnerships' between schools, colleges, industry and higher education. The fundamental criteria in determining new institutional

forms should be the development of models that create a more responsive relationship between ET institutions, employment and the labour market. Ultimately, the only criteria for judging a VET institution as successful or not in our current context (where the majority of enrolments in technical colleges are for pre-employment training) is whether the training received assists graduates in finding employment.

The above argument for a single merged FET institution in the Newcastle/Vryheid district – as would be the case in the other five clusters identified earlier – does not take into account the complex political negotiations that will be required across all these institutions previously divided on the basis of race. Nor does it take into account the sensitive sociocultural institutional identities that have emerged over time that cannot simply be ignored or swept aside. The argument made here is merely a clinical interpretation of what is evident from the geographic, quantitative and qualitative evidence uncovered in the research. The exact parameters of the political and social dimensions of change are equally important, but these issues are not part of the research domain but, rather, they are the prerogative of the key social stakeholders directly involved in the change processes that must take place in education and training in KwaZulu-Natal in the near future. This research exercise and the arguments it has thrown up are merely small contributions to a much larger process that must be owned and directed by the people of KwaZulu-Natal themselves.

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This report comprises a detailed study of technical college provision in KwaZulu-Natal(KZN). The findings raise four significant issues that are relevant to the transformation of technical colleges nationally. Firstly, the teaching and learning environment is sub-optimal. Students receive little academic support and there are almost no academic development programmes for lecturing staff. Secondly, the social relations at the technical colleges are tense, with few institutions having successfully come to terms with the rapid deracialisation of student enrolments over the past five years. Thirdly, the labour market surrounding these institutions appears to be totally dysfunctional as few students obtain employment after technical college training. Lastly, there is clearly a need for institutional restructuring as a result of the separate development policies of the past. The formation of fewer mega-colleges located in key economic regions must be urgently considered as a way of renewing the relevance of these institutions to South Africa's new social and economic needs.

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